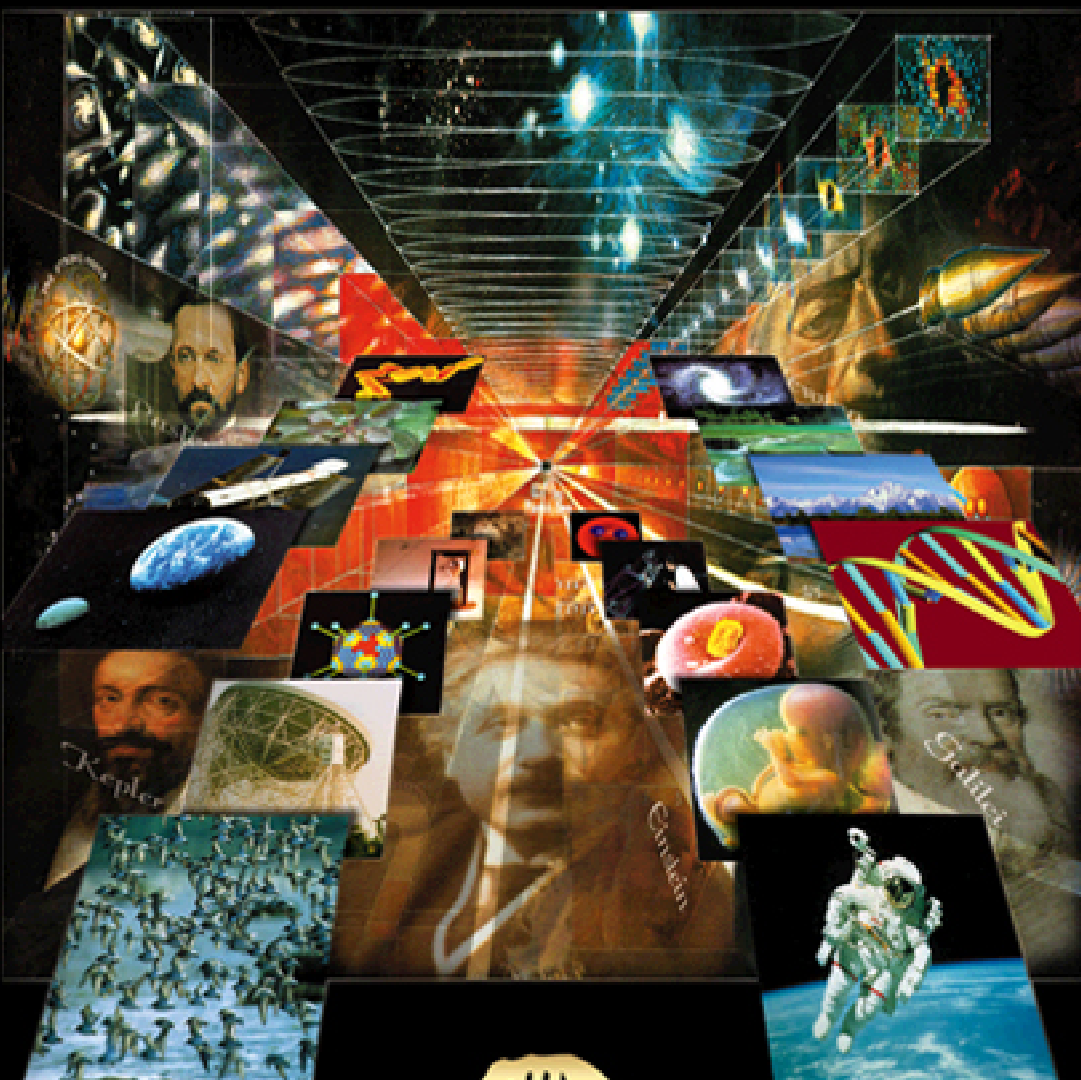
2nd Edition

THE QUR'AN LEADS THE WAY TO SCIENCE



HARUN YAHYA

God summons humanity to investigate and reflect upon the heavens, the earth, mountains, stars, plants, seeds, animals, the alternation of the night and the day, the creation of man, the rain and many other created things. Examining these, man comes to recognize the artistry of God's creation in the world around him, and ultimately, to know his Creator, Who created the entire universe and everything in it from nothing.

"Science" offers a method by which the universe, and all the beings therein, may be examined to discover the artistry in God's creation, thereby communicating it to mankind. Religion, therefore, encourages science, adopting it as a tool by which to study the subtleties of God's creation.

Religion not only encourages scientific study, but also permits that, supported by the truths revealed through religion, scientific research be conclusive and expeditious. The reason being, that religion is the only source to provide accurate and definitive answers as to how life and the universe came into being.

There is one fact that must be recognized clearly: science can achieve reliable results only if it adopts as its main objective the investigation of the signs of creation in the universe, and strives solely towards this end. Science may reach its ultimate goal in the shortest possible time only if it is pointed in the right direction, that is, if it is rightly guided.

ABOUT THE AUTHOR



The author, who writes under the pen-name Harun Yahya, was born in Ankara in 1956. He studied arts at Istanbul's Mimar Sinan University and philosophy at Istanbul University. Since the 1980s, the author has published many books on political, faith-related and scientific issues. Harun Yahya is well-known as an author who has written very important works disclosing the forgery of evolutionists, the invalidity of their claims and the dark liaisons between Darwinism and bloody ideologies. Some of the books of the author have been translated into English, German, French, Italian, Spanish, Portuguese, Albanian, Arabic, Polish, Russian, Bosnian, Indonesian, Turki, Tatar, Urdu and Malay and published in the countries concerned. Harun Yahya's books appeal to all people, Muslims and non-Muslims alike, regardless of their age, race, and nationality, as they center around one goal: to open the readers' mind by presenting the signs of God's eternal existence to them.

بسم الله الرحمن الرحيم

To The Reader

In all the books by the author, faith-related issues are explained in the light of the Qur'anic verses and people are invited to learn God's words and to live by them. All the subjects that concern God's verses are explained in such a way as to leave no room for doubt or question marks in the reader's mind. The sincere, plain and fluent style employed ensures that everyone of every age and from every social group can easily understand the books. This effective and lucid narrative makes it possible to read them in a single sitting. Even those who rigorously reject spirituality are influenced by the facts recounted in these books and cannot refute the truthfulness of their contents.

This book and all the other works of the author can be read individually or discussed in a group at a time of conversation. Those readers who are willing to profit from the books will find discussion very useful in the sense that they will be able to relate their own reflections and experiences to one another.

In addition, it will be a great service to the religion to contribute to the presentation and reading of these books, which are written solely for the good pleasure of God. All the books of the author are extremely convincing. For this reason, for those who want to communicate the religion to other people, one of the most effective methods is to encourage them to read these books.

It is hoped that the reader will take time to look through the review of other books on the final pages of the book, and appreciate the rich source of material on faith-related issues, which are very useful and a pleasure to read.

In these books, you will not find, as in some other books, the personal views of the author, explanations based on dubious sources, styles that are unobservant of the respect and reverence due to sacred subjects, nor hopeless, doubt-creating, and pessimistic accounts that create deviations in the heart.

THE QUR'AN LEADS THE WAY TO SCIENCE

HARUN YAHYA

January, 2004

About The Author

Now writing under the pen-name of HARUN YAHYA, he was born in Ankara in 1956. Having completed his primary and secondary education in Ankara, he studied arts at Istanbul's Mimar Sinan University and philosophy at Istanbul University. Since the 1980s, he has published many books on political, scientific, and faith-related issues. Harun Yahya is well-known as the author of important works disclosing the imposture of evolutionists, their invalid claims, and the dark liaisons between Darwinism and such bloody ideologies as fascism and communism.

His pen-name is a composite of the names *Harun* (Aaron) and *Yahya* (John), in memory of the two esteemed Prophets who fought against their people's lack of faith. The Prophet's seal on the his books' covers is symbolic and is linked to the their contents. It represents the Qur'an (the final scripture) and the Prophet Muhammad (peace be upon him), last of the prophets. Under the guidance of the Qur'an and the Sunnah (teachings of the Prophet), the author makes it his purpose to disprove each fundamental tenet of godless ideologies and to have the "last word," so as to completely silence the objections raised against religion. He uses the seal of the final Prophet, who attained ultimate wisdom and moral perfection, as a sign of his intention to offer the last word.

All of Harun Yahya's works share one single goal: to convey the Qur'an's message, encourage readers to consider basic faith-related issues such as God's Existence and Unity and the hereafter; and to expose godless systems' feeble foundations and perverted ideologies.

Harun Yahya enjoys a wide readership in many countries, from India to America, England to Indonesia, Poland to Bosnia, and Spain to Brazil. Some of his books are available in English, French, German, Spanish, Italian, Portuguese, Urdu, Arabic, Albanian, Russian, Serbo-Croat (Bosnian), Polish, Malay, Uygur Turkish, and Indonesian.

Greatly appreciated all around the world, these works have been instrumental in many people recovering faith in God and gaining deeper insights into their faith. His books' wisdom and sincerity, together with a distinct style that's easy to understand, directly affect anyone who reads

them. Those who seriously consider these books, can no longer advocate atheism or any other perverted ideology or materialistic philosophy, since these books are characterized by rapid effectiveness, definite results, and irrefutability. Even if they continue to do so, it will be only a sentimental insistence, since these books refute such ideologies from their very foundations. All contemporary movements of denial are now ideologically defeated, thanks to the books written by Harun Yahya.

This is no doubt a result of the Qur'an's wisdom and lucidity. The author modestly intends to serve as a means in humanity's search for God's right path. No material gain is sought in the publication of these works.

Those who encourage others to read these books, to open their minds and hearts and guide them to become more devoted servants of God, render an invaluable service.

Meanwhile, it would only be a waste of time and energy to propagate other books that create confusion in people's minds, lead them into ideological chaos, and that clearly have no strong and precise effects in removing the doubts in people's hearts, as also verified from previous experience. It is impossible for books devised to emphasize the author's literary power rather than the noble goal of saving people from loss of faith, to have such a great effect. Those who doubt this can readily see that the sole aim of Harun Yahya's books is to overcome disbelief and to disseminate the Qur'an's moral values. The success and impact of this service are manifested in the readers' conviction.

One point should be kept in mind: The main reason for the continuing cruelty, conflict, and other ordeals endured by the vast majority of people is the ideological prevalence of disbelief. This can be ended only with the ideological defeat of disbelief and by conveying the wonders of creation and Qur'anic morality so that people can live by it. Considering the state of the world today, leading into a downward spiral of violence, corruption and conflict, clearly this service must be provided speedily and effectively, or it may be too late.

In this effort, the books of Harun Yahya assume a leading role. By the will of God, these books will be a means through which people in the twentyfirst century will attain the peace, justice, and happiness promised in the Qur'an.

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Contents

Book One

Book Two

INTRODUCTION

God summons humanity to investigate and reflect upon the heavens, the earth, mountains, stars, plants, seeds, animals, the alternation of the night and the day, the creation of man, the rain and many other created things. Examining these, man comes to recognize the artistry of God's creation in the world around him, and ultimately, to know our Creator, Who created the entire universe and everything in it from nothing.

"Science" offers a method by which the universe, and all the beings therein, may be examined to discover the artistry in God's creation, thereby communicating it to mankind. **Religion, therefore, encourages science, adopting it as a tool by which to study the subtleties of God's creation.**

Religion not only encourages scientific study, but also permits that, supported by the truths revealed through Islam, scientific research be conclusive and expeditious. The reason being, that religion provides accurate and definitive answers as to how life and the universe came into being. As such, if initiated upon a proper foundation, research will reveal the truths regarding the origin of the universe and the organization of life, in the shortest time, and with minimum effort and energy. As stated by Albert Einstein, considered one of the greatest scientists of the 20th century, **"science without religion is lame"**, which is to say, that science, unguided by religion, cannot proceed correctly, but rather, wastes much time in achieving certain results, and worse, is often inconclusive.

Scientific studies pursued by materialist scientists unable to see the truth has, particularly in the last two hundred years, certainly caused a considerable amount of time to be squandered, a great deal of research to be pursued in vain and millions of dollars to have been poured down the drain to no effect.

There is one fact that must be recognized clearly: science can achieve reliable results only if it adopts as its main objective the investigation of the signs of creation in the universe, and strives solely towards this end. Science may reach its ultimate goal in the shortest possible time only if it is pointed in the right direction, that is, if it is rightly guided.



Book One







RELIGION ENCOURAGES SCIENCE

Islam is the religion of reason and conscience. A person recognizes the truth proclaimed by God through the use of his wisdom, but derives conclusions from the truth he has seen by following his conscience. A person using the faculty of his reason and conscience, upon examining the features of any given object in the universe, even though he be not an expert in such matters, would understand that it was created by a Possessor of great Wisdom, Knowledge and Might. And, while perhaps only discovering a few of the thousands of factors that render life possible on the earth, it is sufficient for him to understand that the world was designed to sustain life in it. Therefore, one who makes use of his reason and follows his conscience quickly apprehends the absurdity of the claim that the world came into being by chance. In brief, one who applies his mind by using these faculties recognizes God's signs in their full clarity. A verse refers to such people in the following manner:

Those who remember God, standing, sitting and lying on their sides, and reflect on the creation of the heavens and the earth: 'Our Lord, You have not created this for nothing. Glory be to You! So safeguard us from the punishment of the Fire. (Surat Al 'Imran: 191)

In the Qur'an, God calls on people to reflect upon and examine the signs of creation around them. The Prophet Muhammad, God's Messenger, peace be upon him, also enjoined people to acquire knowledge. He even stressed that it is our obligation to search for knowledge. We read the following authentic *Ahâdîth*:

Seeking of knowledge is incumbent upon every Muslim.[1]

Acquire the knowledge and impart it to the people.[2]

Everyone who probes the inner-workings of the universe, living and non-living things, and considers and investigates what he sees around him, will come to know God's superior wisdom, knowledge, and eternal power. Some of the issues God invites man to ponder are pointed out in the following verses form the Qur'an:

Do they not look at the sky above them? How We have made it and adorned it, and there are no flaws in it? And the earth- We have spread it out, and set thereon mountains standing firm, and produced therein every kind of beautiful growth (in pairs)- To be observed and commemorated by every devotee turning (to God). And We send down from the sky rain charged with blessing, and We produce therewith gardens and grain for harvests; And tall (and stately) palm-trees, with shoots of fruit-stalks, piled one over another. (Surah Qaf: 6-10)

The signs of the existence of God, the Exalted Creator, in the universe are clearly apparent to anyone who thinks and uses his wisdom and follows his conscience.



He Who created the seven heavens one above another: No want of proportion will you see in the Creation of (God) Most Gracious. So turn your vision again: do you see any flaw? (Surat al-Mulk: 3)

Now let man but think from what he is created! (Surat at-Tariq: 5)

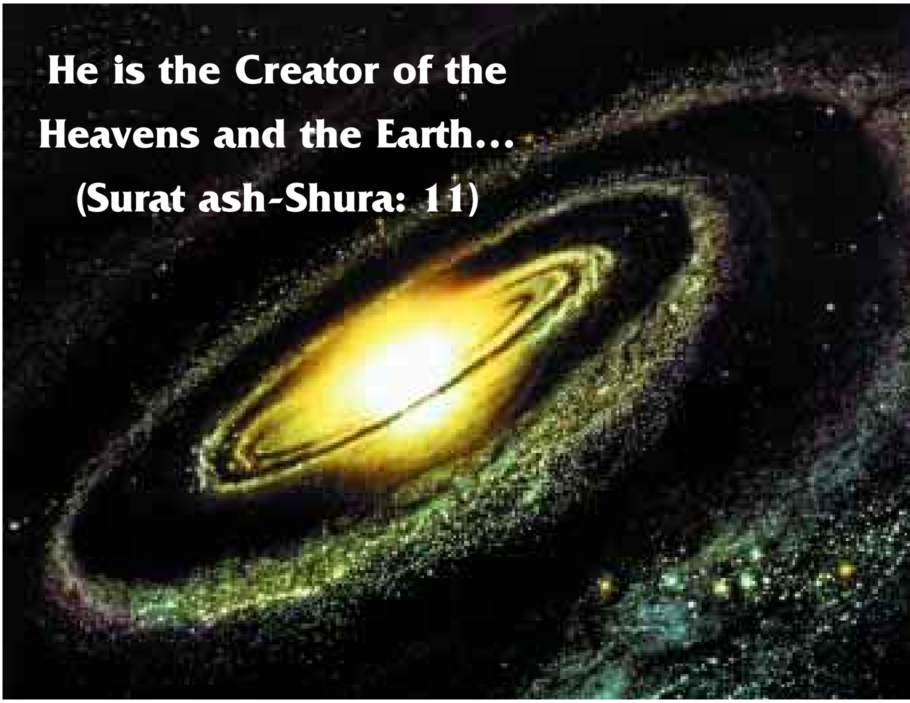
Do they not look at the Camels, how they are made? And at the Sky, how it is raised high? And at the Mountains, how they are fixed firm? And at the Earth, how it is spread out? (Surat al-Ghashiyah: 17-20)

As the above verses make clear, God summons mankind to study and examine various aspects of the world, such as the heavens, rain, plants, animals, birth and geographical landmarks. One way to explore these is, as we previously mentioned, through science. Scientific observation introduces man to the mysteries of creation, and ultimately, to God's eternal knowledge, wisdom and power. **Science is a way to achieve a just estimate of God**, for which reason, throughout history, a great number of the scientists who have been of great service to humanity were devout believers in God.

Belief in God Makes Scientists Enthusiastic and Motivated

As we mentioned above, religion encourages science, and those who use their reason and follow their conscience in the pursuit of scientific research acquire a strong faith because they apprehend God's signs at close hand. They are confronted with a flawless system and a perfect subtlety created by God in every avenue of research they follow, and in every discovery they make. As Prophet Muhammad, God's Messenger, peace be upon him, said, they act by knowing that "One who goes out to search for knowledge is (devoted) to the cause of God till he returns."[3]

A scientist conducting research into the eye, for instance, discovers, even upon recognizing its complex system, that it could never have come into being through a gradual process of coincidences. Further examination will lead him to realize that every detail in the structure of the eye is a miraculous creation. He sees that the eye is made up of dozens of components working together in harmony, thus increasing his wonder in God Who created it.



Similarly, a scientist investigating the cosmos will find himself immediately confronted with thousands of remarkable equilibria. He further gains a great thirst for knowledge upon discovering that billions of galaxies, and billions of stars within these galaxies, continue to exist in a grand harmony, in a vastness of space that has no limits.

As such, a man of faith becomes greatly enthralled and inspired to conduct scientific studies to uncover the mysteries of the universe. In one of his articles, Albert Einstein, considered the greatest genius of the previous era, referred to the inspiration scientists derive from religion:

> …I maintain that the cosmic religious feeling is the strongest and noblest motive for scientific research. Only those who realize the immense efforts and, above all, the devotion without which pioneer work in theoretical science cannot be achieved are able to grasp the strength of the emotion out of which alone such work, remote as it is from the immediate realities of life, can issue. What a deep conviction of the rationality of the universe and what a yearning to understand, were it but a feeble reflection of the mind revealed in this world, Kepler

and Newton must have had to enable them to spend years of solitary labour in disentangling the principles of celestial mechanics!

Those whose acquaintance with scientific research is derived chiefly from its practical results easily develop a completely false notion of the mentality of the men who, surrounded by a skeptical world, have shown the way to kindred spirits scattered wide through the world and the centuries. Only one who has devoted his life to similar ends can have a vivid realization of what has inspired these men and given them the strength to remain true to their purpose in spite of countless failures. **It is cosmic religious feeling that gives a man such strength.** A contemporary has said, not unjustly, that in this materialistic age of ours the serious workers are the only profoundly religious people.[4]

Johannes Kepler related that he engaged in science to **delve the Creator's works**, while Isaac Newton, another great scientist, stated that the main thrust behind his interest in science was **his wish to have a better sense and knowledge of God.**

These were the remarks of only a few of the most eminent scientists in history. These, and hundreds of other scientists that we will consider in the pages ahead, came to believe in the existence of God by exploring the universe, and, impressed by the laws and phenomena God has gloriously created, craved to discover more.

As we will see, the desire to learn the manner in which God created the universe has served as the greatest motivating factor for many scientists in history. That is essentially because, someone who perceives that the universe and all living things are created also perceives that this creation has a purpose. Purpose then leads one to meaning. It is the aspiration to grasp this meaning, to uncover its signs, and discover its details, that can greatly expedite scientific studies.

If, however, the fact that the universe and living things are created is denied, this meaning escapes too. A scientist believing in the materialist philosophy and in Darwinism will suppose that the universe is purposeless, and that everything is the work of blind chance. Therefore, investigation of the universe and living things would be without a pursuit for meaning. Addressing this fact, Einstein stated, **"I have found no better expression than 'religious' for confidence in the rational**

nature of reality, insofar as it is accessible to human reason. Whenever this feeling is absent, science degenerates into uninspired empiricism."[5]

In such a case, the sole purpose of a scientist would either be to achieve fame through a groundbreaking discovery, to be remembered in history, or to become wealthy. Such aims may easily divert him from his sincerity and scientific integrity. For instance, in the event that a conclusion he had reached through scientific research was in contradiction with the conventional view of the scientific community, he may be forced to keep it as a secret, so as not to be robbed of his fame, or be vilified, or degraded.

The long-held acceptance of the theory of evolution in the scientific world is an example of this type of lack of sincerity. Basically, many scientists, in the face of scientific fact, are aware that the evolutionary theory is far from being able to explain the origin of life, but they cannot state it openly, simply out of the fear of encountering a negative reaction. In that line of thought, British physicist H.S. Lipson makes the following confession:

> We now know a great deal more about living matter than Darwin knew. We know how nerves work and I regard each nerve as a masterpiece of electrical engineering. And we have thousands of millions of them in our body… **"Design" is the word that springs to mind, on this subject. My biologist colleagues do not like it.**[6]

The word "design" is cast aside in the scientific literature merely because it is disliked, with many scientists succumbing to such dogmatism. In addressing the issue, Lipson says:

> In fact, evolution became in a sense a scientific religion; almost all scientists have accepted it and many are prepared to 'bend' their observations to fit in with it.[7]

This undesirable situation is the result of the deception of "ungodly science" that held sway over the scientific community beginning in the mid of the 19th century. However, as Einstein stated, **"science without religion is lame"**[8]. The delusion has not only directed the scientific community towards mistaken goals, but has also created scientists who, despite recognizing the error, remain indifferent to it.

We will deal with the former matter in detail in the pages ahead.

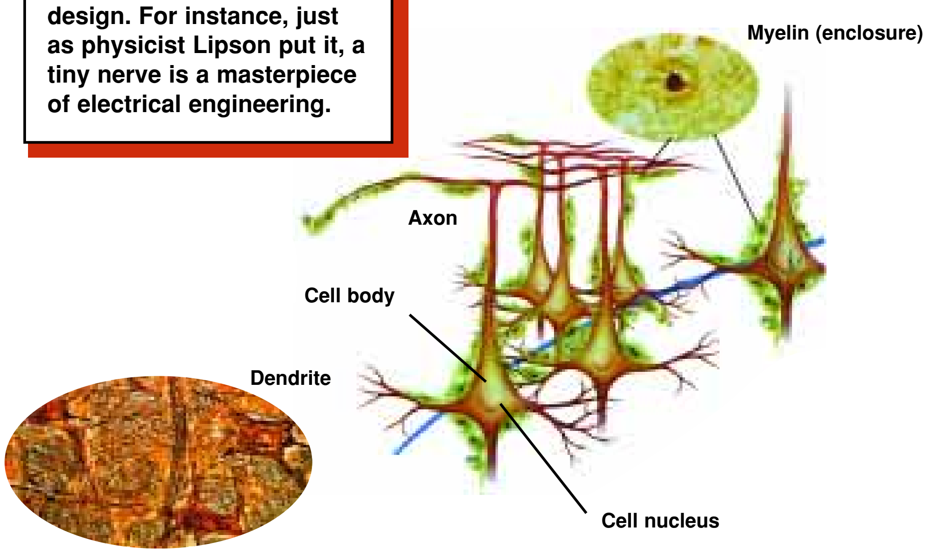
Believing Scientists' "Eagerness to Serve"

Because scientists who believe in God's oneness and omnipotence have no desire for worldly gain, such as status, rank, reputation, or money, their efforts in scientific research are sincere. They know that every mystery of the universe they unravel will increase mankind's understanding of God, helping to reveal God's infinite power and knowledge. Confirming God's existence for humanity, demonstrating to it the reality of creation, is a truly important act of worship for a believer.

Driven by such sincere concerns, believing scientists conduct important extensive research with a great enthusiasm, to discover the laws of the universe, the miraculous systems in nature, and the perfect mechanisms and intelligent behaviors in living things. They achieve great results and make tremendous progress. They never falter in the face of the problems they encounter, nor do they lose heart when they fail to be appreciated by others. They only seek to gain God's approval for the work they do.

They strive to serve other believers purely for God's good pleasure. And, they recognize no limits to their endeavor. They do their best to be of utmost use to people, and to serve them in the best way. Furthermore, their sincere efforts make them highly productive, and their studies lead to positive results.

Every living thing in the universe has a perfect design. For instance, just as physicist Lipson put it, a tiny nerve is a masterpiece of electrical engineering.



Those who assume that science must be distinguished from religion certainly fall into great error. First of all, those who do not believe in God cannot experience the spiritual upliftment of faith. The scientific projects they initiate with great zeal soon turn out to be monotonous and uninspiring. Their motivation, in such a mindset, becomes solely to reap short-lived worldly profit. Pursuing the fulfillment of worldly desires, such as wealth, rank, reputation, or prestige, they are only committed to conducting research that will directly contribute to such personal benefits. For instance, a scientist with such a mindset and motivated by career interests would pursue research only in those fields that will lead to a promotion. He would not be willing to conduct research in a subject he believes to be useful to mankind unless it served his best interest. Or, if he were in a position to make a choice between two research topics, he would choose the one that would earn him more material gain, prestige, or rank, while discarding the one that might be more beneficial to mankind. In short, scientists of this sort are rarely of benefit to humanity, failing to serve the greater good unless there is some promised gratification in return. When the opportunity for personal gain fades, so wanes their eagerness to serve humanity.

Prophet Muhammad, God's Messenger, peace be upon him, also referred to the harms of this mentality. He said:

> Do not acquire knowledge in order to fall into polemics with other scholars and prove his superiority over them, or to dispute with the ignorant or to attract the attention of the people.[9]

On the other hand, Prophet Muhammad praised the dissipation of beneficial knowledge. A hadith reads:

> God calls down blessings on those who **instruct people in beneficial knowledge.**[10]

Aware of the blessings he will receive, the enthusiasm and sincere motivation experienced by a person who believes in God opens up new vistas for him, not only in the field of science, but also in many other spheres of life, such as art, culture, and so on. These high spirits never fade, but rather, become increasingly intense.

RELIGION HELPS SCIENCE TO BE RIGHTLY GUIDED

Science is the investigation of the material world we live in through observation and experiment. Accordingly, in conducting such investigation, science will lead to various conclusions based on the information collected through observation and experimentation. In addition, however, every discipline of science also has certain norms that are simply taken for granted, or accepted without further verification. In scientific literature, this set of norms is called a "paradigm".

This initial outlook charts the "course" of all related scientific investigation. As is known, the first step in scientific investigation is the formulation of a "hypothesis". To begin with, for their research topic, scientists must form a hypothesis. Then, this hypothesis is tested through scientific experimentation. If observations and experiments verify the hypothesis, the "hypothesis" is called an "established principle or law". If the hypothesis is disproved, then new hypotheses are tested, and the process continues.

The formulation of the hypothesis, which is the first step of the process, is often dependent on the scientists' basic viewpoint. For instance, scientists, if committed to an erroneous outlook, could base their work on a hypothesis that "matter has a tendency to self-organize without the involvement of a conscious agent". Then, they would conduct years of research to verify that hypothesis. Yet, since matter has no such capability, all these efforts are bound to fail. Furthermore, if scientists are overly obstinate about their hypothesis, the research may well last for years, and even for generations. The end result, though, would be but **a huge waste of time and resources.**

However, had the point of assumption been the idea that "it is

impossible for matter to self-organize without conscious planning", that scientific research would have followed a more expeditious and productive course.

This issue, that is, the issue of establishing a proper hypothesis, requires an entirely different source than mere scientific data. Correct identification of this source is critical, because, as we explained in the above example, an error in the identification of a source may cost the science-world years, decades, or even centuries.

The source sought is God's revelation to mankind. God is the Creator of the universe, the world and of living things, and therefore, the most accurate and indisputable knowledge about these subjects derives from Him. In accordance, God has revealed to us important information about these matters in the Qur'an. The most fundamental of these are as follows:

1) God created the universe from nothing. Everything is created for a particular purpose. It follows that there is not a chaos of chance-happenings in nature or the universe, but **a perfect order created with an intelligent design.**

2) The material universe, and predominantly, the Earth we live in, is specially designed to allow for human life. There is a certain **purpose** in the movements of stars and planets, in geographical landmarks, and in the properties of water or the atmosphere, that makes human life possible.

3) **God created all living things.** Moreover, these creatures act through the inspiration of God, as quoted in the Qur'an in the example of the honeybees, with the verse that begins with, **"Your Lord inspired the bees…"** (Surat an-Nahl: 68)

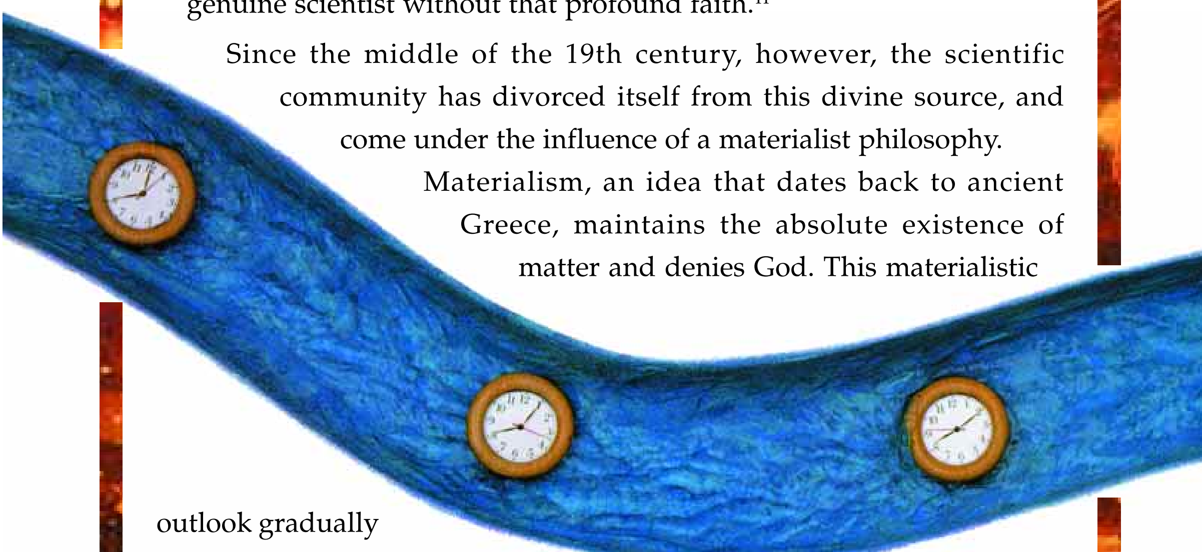
These are absolute truths communicated to us by God in the Qur'an. An approach to science based on these facts will inevitably lead to remarkable progress and serve humanity in the most beneficial manner. We find numerous examples of this in history. It was only possible with the placement of science on proper a foothold that Muslim scientists, who were then helping to forge the greatest civilizations in the world, contributed to major achievements in the 9th and 10th centuries. In the West, the pioneers in all fields of science, from physics to chemistry,

astronomy to biology and paleontology, were great men of science who believed in God, and who conducted research for the sake of exploring what He created.

Einstein also maintained that scientists must rely on religious sources when developing their objectives:

> Though religion may be that which determines the goal, it has, nevertheless, learned from science, in the broadest sense, what means will contribute to the attainment of the goals it has set up. But science can only be created by those who are thoroughly imbued with the aspiration toward truth and understanding. This source of feeling, however, springs from the sphere of religion… I cannot conceive of a genuine scientist without that profound faith.[11]

Since the middle of the 19th century, however, the scientific community has divorced itself from this divine source, and come under the influence of a materialist philosophy. Materialism, an idea that dates back to ancient Greece, maintains the absolute existence of matter and denies God. This materialistic



outlook gradually made its way into the scientific community, and, beginning in the middle of the 19th century, a considerable portion of scientific investigation was initiated to support it. To this purpose, many theories were formulated, such as the "infinite universe model" suggesting that the universe exists since infinite time, Darwin's evolutionary theory claiming that life is the work of chance, or Freud's views holding that the human mind consists of the brain alone.

Today, in retrospect, we see that **the claims put forth by materialism were but a waste of time for science.** For decades, a great number of scientists have expended their best efforts to prove each of these claims,

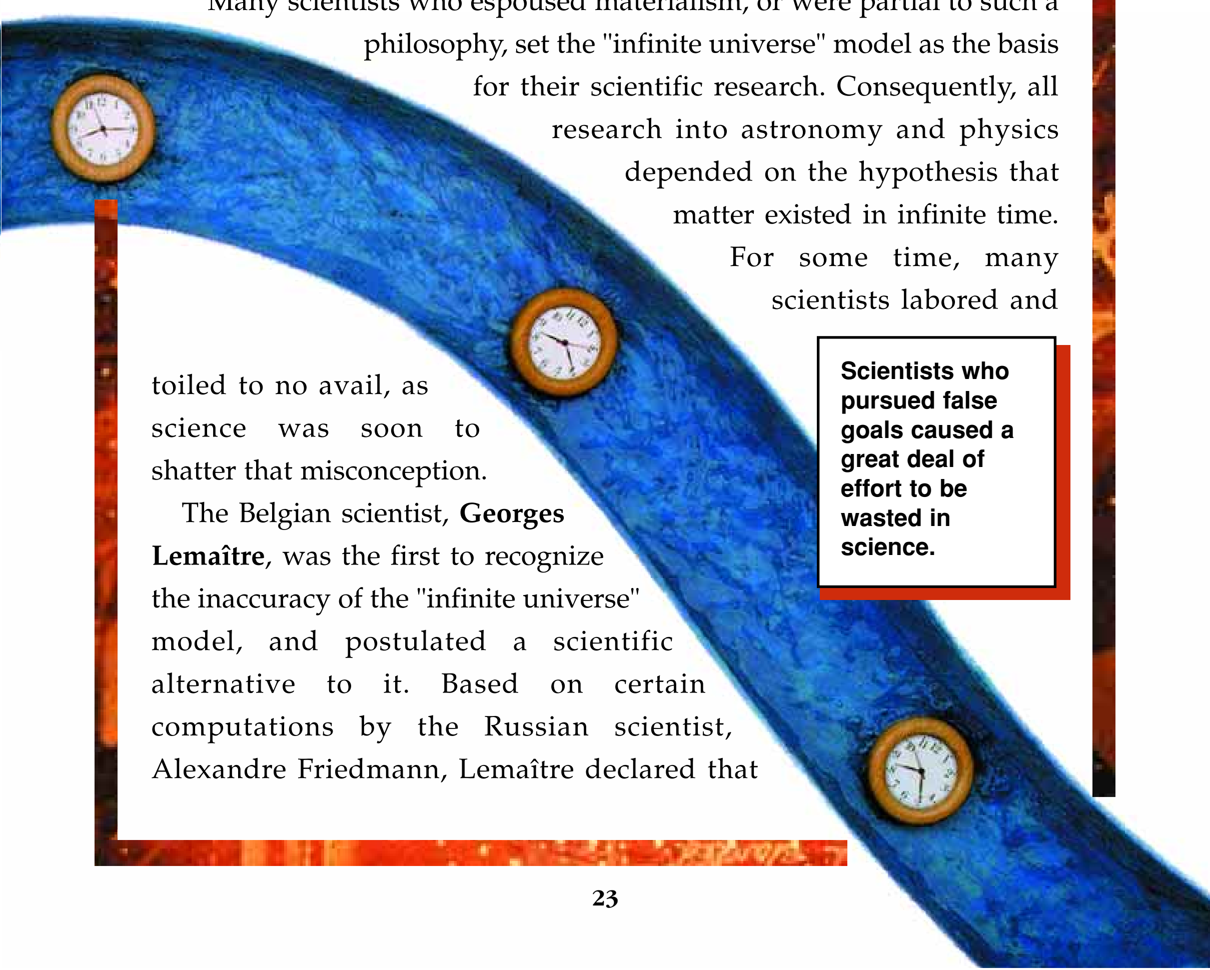
but the results always proved them wrong. Discoveries confirmed the proclamations of the Qur'an – that the universe was created from nothing, that it is tailored to suit human life, and that it is impossible for life to have come into being and evolved by chance.

Now let us consider these facts one by one.

The Losses the Materialists' Obsession With an "Infinite Universe" Have Caused Science

Until the early 20th century, the conventional opinion of the scientific community, which was then under the influence of the materialists, was that the universe has infinite dimensions, that it existed in infinite time, and will exist infinitely. According to this view, called the "static universe model", the universe had neither a beginning nor an end, and was simply a limitless conglomeration of matter. Denying that the universe was created, this view laid the groundwork for the materialist philosophy.

Many scientists who espoused materialism, or were partial to such a philosophy, set the "infinite universe" model as the basis for their scientific research. Consequently, all research into astronomy and physics depended on the hypothesis that matter existed in infinite time. For some time, many scientists labored and toiled to no avail, as science was soon to shatter that misconception.



Scientists who pursued false goals caused a great deal of effort to be wasted in science.

The Belgian scientist, **Georges Lemaître**, was the first to recognize the inaccuracy of the "infinite universe" model, and postulated a scientific alternative to it. Based on certain computations by the Russian scientist, Alexandre Friedmann, Lemaître declared that



With his giant telescope, Hubble discovered that the stars were racing away, not only from us, but also from each other.

the universe actually had a beginning, and that it was **expanding since that initial moment**. He also asserted that it must be possible to detect the remnants of radiation from that initial moment.

Here, it should be noted that Georges Lemaître was also a priest. Lemaître strongly believed that "the universe was created by God from nothingness". Therefore, his approach to science greatly differed from that of the materialists.

The years to come confirmed the correctness of the assumption put forth by Lemaître. Firstly, American astronomer, Edwin Hubble, discovered with his huge telescope that the stars were moving away both from us and from each other. This meant that the universe was expanding,

and thus, was not static as materialists assumed.

In fact, earlier on, Albert Einstein had already theoretically calculated that the universe could not be static. However, he put the theory to rest, simply because his calculations did not concur with the widely recognized static universe model of his time. Even a scientist considered the greatest genius of the century was intimidated by the dogmatism of the materialist view, having chosen not to reveal the important discovery. Later on, Einstein was to refer to that choice as **'the greatest mistake of his career'**.

There was another important truth that the expansion of the universe pointed to: if the universe was getting larger as time went on, then, following it backward in time meant that it would become smaller; and if one went back far enough, everything would shrink and converge to a single point. Calculations showed that this single point should have zero volume. Our universe came into being as the result of the explosion of this point, an explosion which has come to be called the **"the Big Bang"**.

In fact, the reference to this exploding point having zero volume is but a theoretical expression. The expression of zero volume simply suggests "nothingness". The whole universe was created from **"nothing"**.

The Big Bang theory clearly demonstrated that the universe was created from nothing. Nevertheless, further scientific evidence was required in order for the theory to be widely accepted. In 1948, George Gamov proposed that, if the universe was formed in a sudden, cataclysmic explosion, as Lemaître had suggested, there ought to be a definite amount of radiation left over from that explosion, and that this radiation must be uniform throughout the universe.

Scientific confirmation of Gamov's postulate was forthcoming. In 1965, two researchers by the name of Arno Penzias and Robert Wilson discovered the remnants of that radiation. Called **"cosmic background radiation"**, it was not localized but distributed equally everywhere in the universe. It was soon realized that this radiation was the echo of the Big Bang, still reverberating since the first moments of that great explosion. Penzias and Wilson were awarded a Nobel prize for their discovery.

In 1989, NASA, the National Aeronautics and Space Administration, launched the COBE satellite into space, for the purpose of research into



It required a very short time for the Cobe satellite to find the evidence to prove the hypothesis of the Big Bang.

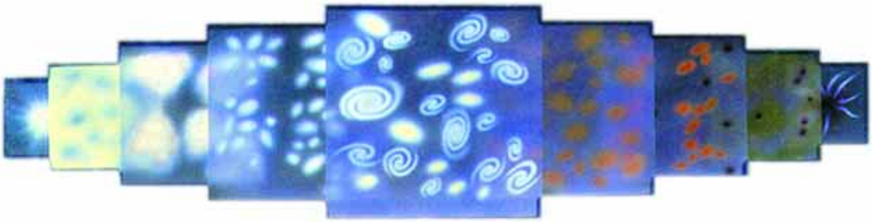
cosmic background radiation. Within minutes, the satellite's sensitive scanners confirmed the measurements of Penzias and Wilson.

Discovery of the evidence confirming the creation of the universe from nothing in the "Big Bang" staggered materialist scientists. They witnessed the collapse of their extensive research, their hypotheses, and unsubstantiated theories, one after the other. The renowned atheist philosopher, Antony Flew, had these comments to offer about the situation:

> Notoriously, confession is good for the soul. I will therefore begin by confessing that the Stratonician atheist has to be embarrassed by the contemporary cosmological consensus. For it seems that the cosmologists are providing a scientific proof of what St.. Thomas contended could not be proved philosophically; namely, that the universe had a beginning. So long as the universe can be comfortably thought of as being not only without end but also without beginning, it remains easy to urge that its brute existence, and whatever are found to be its most fundamental features, should be accepted as the explanatory ultimates. Although I believe that it remains still correct, it certainly is neither easy nor comfortable to maintain this position in the face of the Big Bang story.[12]

As the above example makes clear, if someone is blindly devoted to materialism he is reluctant to admit any evidence to the contrary. Even if he must confess to the fact, he does not compromise his commitment to materialism.

On the other hand, many scientists, who did not resolve themselves unconditionally to denying God's existence, today accept that God, the All-Powerful, created the universe. One such example is the American scientist William Lane Craig, who is known for his research on the Big Bang:



The universe came into being through the explosion of a single point-mass that had zero volume. This explosion, called the Big Bang, demonstrated with compelling evidence that the universe was created from nothing, and permanently demolished the materialists' claims of an infinite universe.

Indeed, given the truth of the maxim *ex nihilo nihil fit* (out of nothing comes nothing), the Big Bang requires a supernatural cause. Since the initial cosmological singularity represents the terminus of all space-time trajectories, there cannot be any physical cause of the Big Bang. Rather, the cause must transcend physical space and time: it must be independent of the universe, and unimaginably powerful. Moreover, this cause must be a personal being, endowed with free will... **The cause of the origin of the universe** must therefore be a personal **Creator**, who a finite time ago brought the universe into existence by his free agency.[13]

Another important conclusion to be drawn from the Big Bang theory is that, as we have mentioned earlier, a scientific approach based on divine knowledge will be highly successful in unraveling the mysteries of the universe. Scientists who proceeded from a materialist philosophy and put forth the "infinite universe" model, were unable to substantiate it, despite their best efforts. However, the Big Bang theory, which Georges Lemaître developed, and which was based on divine sources, contributed to scientific progress and helped to uncover the true origin of the universe.

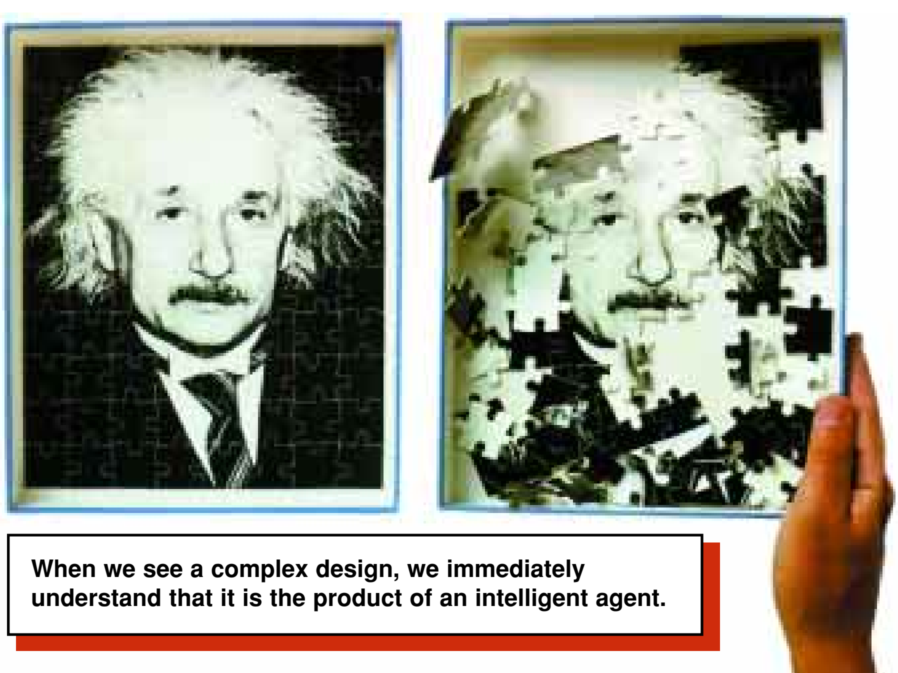
When we look at the history of 20th century science, we see that similar occurrences took place in other fields as well.

The Losses The Claim That "There is No Design in Nature" Caused Science

Materialists not only proposed that the universe existed since infinite time, but also claimed that there is no design or purpose in the universe. They argued that the entire equilibrium, harmony, and order in the universe was the work of chance. This claim, which dominated the world of science beginning in the second half of the 19th century, dictated the subsequent course of scientific investigation.

For instance, certain scientists put forth an assumption called the "chaos theory" to show that there is no design in the universe. According to this theory, order may spontaneously form from chaos, and a number of scientific studies were conducted to support the claim. Mathematical calculations, studies in theoretical physics, physical trials and chemical experiments, were all conducted to find an answer to the question, "how can we demonstrate that the universe is the product of chaos?"

Every new discovery, however, further denied the chaos and chance theories, revealing that there is an enormous design in the universe. Research conducted since the 1960s consistently demonstrated that all the

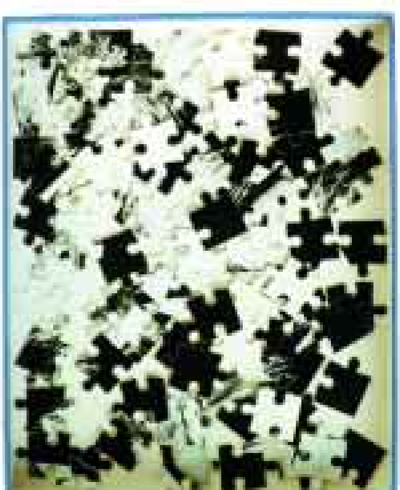


When we see a complex design, we immediately understand that it is the product of an intelligent agent.

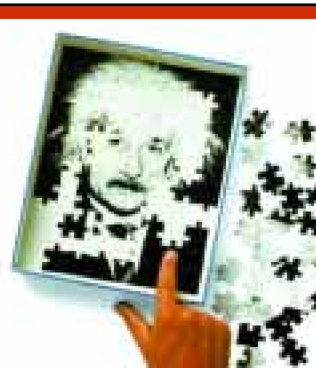
physical equilibria in the universe are intricately designed to render life possible. As research proceeded, it was discovered that each and every one of the laws of physics, chemistry, and biology, of the fundamental forces such as gravity and electromagnetism, and of the details of the structure of atoms and the elements of the universe, has been precisely tailored so that human beings may exist. Scientists refer to this extraordinary design as the **"Anthropic Principle"**. This is the principle by which every detail in the universe has been carefully arranged to make human life possible.

With these discoveries, the dictum formerly imposed on the scientific community by the materialist philosophy, touting that "the universe is a heap of matter with no meaning and purpose working according to chance", was exposed to be an unscientific fallacy. Noted molecular biologist Michael Denton makes the following comment in his book, *Nature's Destiny: How the Laws of Biology Reveal Purpose in the Universe:*

> The new picture that has emerged in twentieth-century astronomy presents a dramatic challenge to the presumption which has been prevalent within scientific circles during most of the past four centuries: that life is a peripheral and purely contingent phenomenon



Only a highly intelligent person can reconstruct the scattered pieces of Albert Einstein's puzzle seen here. It is therefore certain that systems far more sophisticated and perfect than this in the universe were designed by God, Who has infinite knowledge and wisdom.





Just as the racist ideology brought disaster for humanity by leading to World War II, so did the materialist ideology drag the world of science into darkness needlessly.

in the cosmic scheme… **The evidence provided by modern cosmology and physics is exactly the kind of evidence that the natural theologians were looking for in the seventeenth century but failed to find in the science of their day.**[14]

The "natural theologians" referred to above are the 17th century and 18th century religiously devout scientists who strove to invalidate atheism on scientific grounds, and thus prove the existence of God. However, as also stated in the above quotation, the inferior degree of scientific knowledge at that time did not allow them to substantiate the truths they perceived, and materialism, deriving support from the same primitive level of science, grew in authority in the scientific world. 20th century science, however, has reversed that course, and provided conclusive evidence to prove that the universe was created by God.

Here, the real point to be considered is the extraordinary amount of time that has gone into studies to prove the materialist delusion, that claimed, "there is no purpose and design in the universe". All such theories, formulae, studies in theoretical physics, mathematical equations,

etc., eventually proved to be worthless attempts expended in vain. Just as the racist ideology brought disaster for humanity by leading to World War II, so did the materialist ideology drag the world of science into darkness needlessly.

If, however, the scientific community had based its efforts, not on the misconception of materialism, but on the reality that the universe was created by God, scientific research would have taken a more proper course.

The Loss The Hopeless Efforts to Prove the Theory of Evolution Have Caused Science

The most instructive example of an improper orientation for science, was the adoption of Darwin's evolutionary theory. Having been introduced to the agenda of scientific study a 140 years ago, this theory is actually the greatest fallacy perpetrated in the history of science.

The theory of evolution contends that life came about by the configuration of lifeless matter through chance. The same theory further claims that organisms which have been formed by chance evolved into other creatures again by chance. At center stage for the last one and a half centuries, has been the concerted effort to find scientific justification for this scenario, whose results though, ironically, proved only the contrary. **Scientific evidence** has demonstrated that evolution never took place, that the possibility of the gradual transformation from one species to another is out of the question, and that **all living species were created distinctly and in their present forms**.

Nevertheless, despite all firm evidence, evolutionists perform countless studies and experiments, write volumes of books crammed with nothing but fallacies and errors, establish institutions, hold conferences, and air television programs, to prove evolution. The exploitation of thousands of scientists, and measureless amounts of money and resources, for an unprovable assertion, has certainly been a serious detriment for humanity. Had these resources been properly directed, such a loss would not have been incurred, but great strides rather would have been achieved, and definitive results attained in more pertinent areas of scientific study.

On the other hand, a number of scientists or thinkers have realized what a grave misconception the theory of evolution has been. British philosopher, Malcolm Muggeridge, for instance, makes the following comment:

> I myself am convinced that the theory of evolution, especially the extent to which it's been applied, will be one of the great jokes in the history books in the future. Posterity will marvel that so very flimsy and dubious an hypothesis could be accepted with the incredible credulity that it has.[15]

The Scandinavian scientist Søren Løvtrup makes the following remark in his book *Darwinism: The Refutation of a Myth*:

> I suppose that nobody will deny that it is a great misfortune if an entire branch of science becomes addicted to a false theory. But this is what has happened in biology: for a long time now people discuss evolutionary problems in a peculiar 'Darwinian' vocabulary – 'adaptation', 'selection pressure', 'natural selection', etc. – thereby believing that they contribute to the explanation of natural events. They do not … I believe that one day the Darwinian myth will be ranked the greatest deceit in the history of science.[16]

Even a number of evolutionary scientists have recognized that the theory they advocate does not concur with fact and feel uneasy about it. **"Perpetuation of today's theory (of evolution) as dogma will not encourage progress toward more satisfactory explanations of observed phenomena"**[17], says evolutionist scientist Paul R. Ehrlich in an interview with *Science*, where he – though indirectly – admits the harm blind devotion to the evolutionary theory inflicts on science.

Now, let us look at all the futile effort made to support the unscientific claims of the theory of evolution, which cost science nothing but a great waste of time and resources.

The Losses the Claim That "Inanimate Matter Can Form Life" Caused Science

What is the origin of life? What distinguishes a bird, or a giraffe from a stone, water, earth, that is, inanimate matter?

The answer to this question has been a matter of curiosity since antiquity. The predominant views are two. The first idea is that there is a very fine line between animate and inanimate matter, which can easily be pierced, and that life can spontaneously arise from inanimate matter. This view is called "abiogenesis" in scientific literature.

The second idea maintains that there is an unsurpassable border between living and non-living matter. According to this view, it is impossible for living organisms to develop from non-living materials, and a life-form can arise only if it comes from another life-form. This view, summed up as "life comes only from life", is called "biogenesis".

Interestingly, the idea of "abiogenesis" is connected to the materialist philosophy, whereas the idea of "biogenesis" stems from religious sources. The materialist philosophy has always argued that non-living materials can give rise to living organisms. The Greek philosophers believed that simple life-forms continuously arose from non-living matter.

On the contrary, divine sources state that the only power to give life to inanimate matter can be God's creative power. The verses of the Qur'an read:

It is God Who causes the seed-grain and the date stone to split and sprout. He causes the living to issue from the dead, and He is the One to cause the dead to issue from the living. That is God: then how are you deluded away from the truth? (Surat al-An'am: 95)

To Him belongs the dominion of the heavens and the earth: It is He Who gives Life and Death; and He has Power over all things. (Surat al-Hadid: 2)

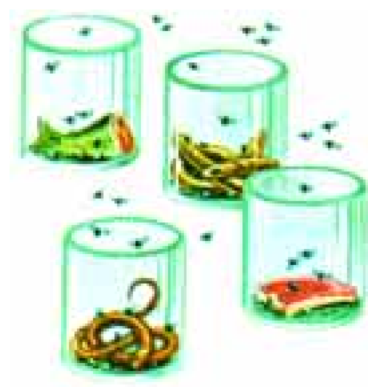
In the Middle Ages, when people had a very limited knowledge of nature, the view of "abiogenesis" prevailed because of certain erroneous observations. Those who saw that maggots developed on uncovered meat thought that it happened "spontaneously". They also supposed that mice appeared spontaneously in wheat grains kept in storage. This belief, also called "spontaneous generation", was widely accepted until the 17th century.

Experiments conducted by two important scientists, however, laid the idea of spontaneous generation in its grave. The first of them was Francisco Redi. Redi showed, with the experiments he carried out in 1668,

that the maggots that appeared on meat did not form spontaneously, but came from flies laying their eggs on it. Upon this discovery, the defenders of the "abiogenesis" idea retreated and claimed that, not big organisms like maggots or frogs, but invisible microbes were produced from non-living matter. The debate lingered over the next two centuries. The French biologist Louis Pasteur finally demonstrated, through a series of experiments, that microbes could not develop from non-living materials either. Pasteur summed up his conclusion in the following words:

> Can matter organize itself? In other words, can organisms come into the world without parents, without ancestors? that's the question to be resolved.... There is no known circumstance today in which one can assert that microscopic beings have originated without germs.[18]

Redi and Pasteur had one thing in common: both scientists believed in the existence of God, and that life was created by Him. Their belief played a critical role in their recognition of the absurdity of the idea of abiogenesis. Effectively, while a number of scientists under the influence of materialism (evolutionists such as Darwin, Haeckel, etc.) had subscribed to the view of abiogenesis, others, who

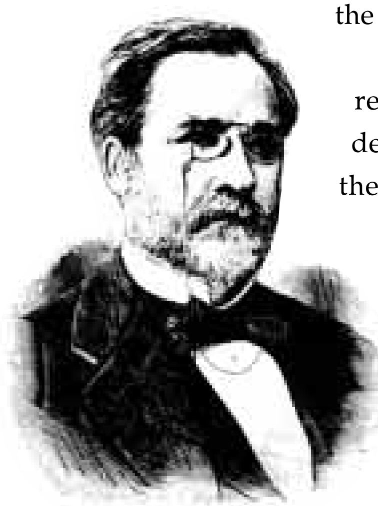




In the scientific understanding of the Middle Ages, people supposed that living organisms could arise from non-living materials. For instance, it was thought that maggots which developed on uncovered meat arose spontaneously. However, this idea was put to rest first by F. Redi's, then by L. Pasteur's discoveries.



approached science with proper insight, realized the fact of "biogenesis".


Louis Pasteur

Evolutionist scientists, however, went on resisting this evident reality. Their blind devotion to the materialist philosophy drew them into a futile struggle that would last a century. Two materialist scientists, Alexander Oparin and J. B. Haldane, introduced the notion of "chemical evolution". According to Oparin and Haldane, abiogenesis did not take place in a short time, but happened over a long period. In conflict with certain scientific laws, foremost among them, the Second Law of Thermodynamics, this claim led the science-world into a stalemate, contributing to a detrimental amount of lost of time.

Over the course of the century, a number of scientists conducted experiments in favor of the chemical evolution hypothesis, or exerted great pains to support the claim with new theories. Huge laboratories, major institutions, and university divisions were set into action. All these efforts, however, ended in failure. Well-known evolutionist Prof. Klaus Dose, the Director of the Institute of Biochemistry, at Johannes-Gutenberg University, confessed that all attempts to produce evidence for the claim that non-living materials produce living matter were inconclusive:

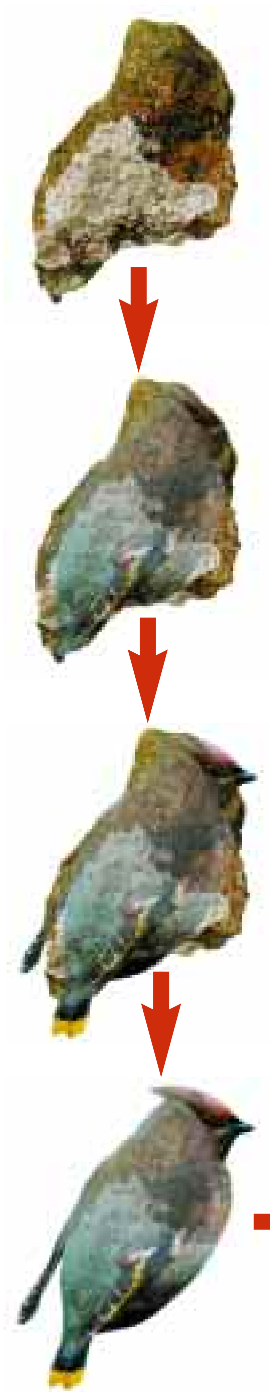
> More than 30 years of experimentation on the origin of life in the fields of chemical and molecular evolution have led to a better perception of the immensity of the problem of the origin of life on Earth rather than to its solution. At present all discussions on principal theories and experiments in the field either end in stalemate or in a confession of ignorance.[19]

If the science-world had not become obsessed with the idea of "abiogenesis", a materialist fallacy, all such efforts, conducted in the name of "chemical evolution", could have been channeled to more productive areas. **Had the scientific community started out by recognizing that life**

is created by God, and that our Lord alone has the power to give life, all this wasted time, money and human resources, could have been avoided. Would such have been the case, science could concentrate on new discoveries and research useful to mankind, rather than seeking to prove Ancient Greek myths.

Today, the scientific community has demonstrated that non-living materials cannot self-organize through random events

Today the scientific community has demonstrated that non-living materials cannot self-organize through random events, and then join with other non-living materials to form a perfect and highly complex living thing. God, the Lord of all worlds, created all things, and He alone has the power to give life.





and then join with other non-living materials to form perfect and highly complex cells. It has also become obvious that the millions of life-forms we see around us could not have formed, as evolutionists claim, from cells that came together accidentally. Certainly, **a rose, a peacock, a tiger, an ant, in other words, no living being, could have come into existence by the will of unconscious cells made up of the combination of unconscious atoms.**

A scientist performing extensive studies into these subjects is by no means a product of the common decision taken by unconscious atoms. It is certainly impossible for unconscious atoms to develop a fully conscious human being.

In this regard, hundreds of years ago it was related in the Qur'an that life was created by God from "nothing", that God alone gives life, and no other being but He has the power to "give life". If science had ascertained the implications of the facts transmitted by God to mankind, it would not have "toyed away" in inconclusive research for such a long period of time.

The Losses The Efforts to Prove the Claim of "The Evolution of Species" Caused Science

There are millions of living species on the earth, and these species differ from one another in a variety of ways. Consider, for instance, horses, birds, snakes, butterflies, fish, cats, bats, worms, ants, elephants, mosquitoes, bees, dolphins, starfish, jellyfish, camels... All these forms of life greatly differ from each other in their physical characteristics, habitats, hunting techniques, defense tactics, feeding habits, reproduction, and so on.

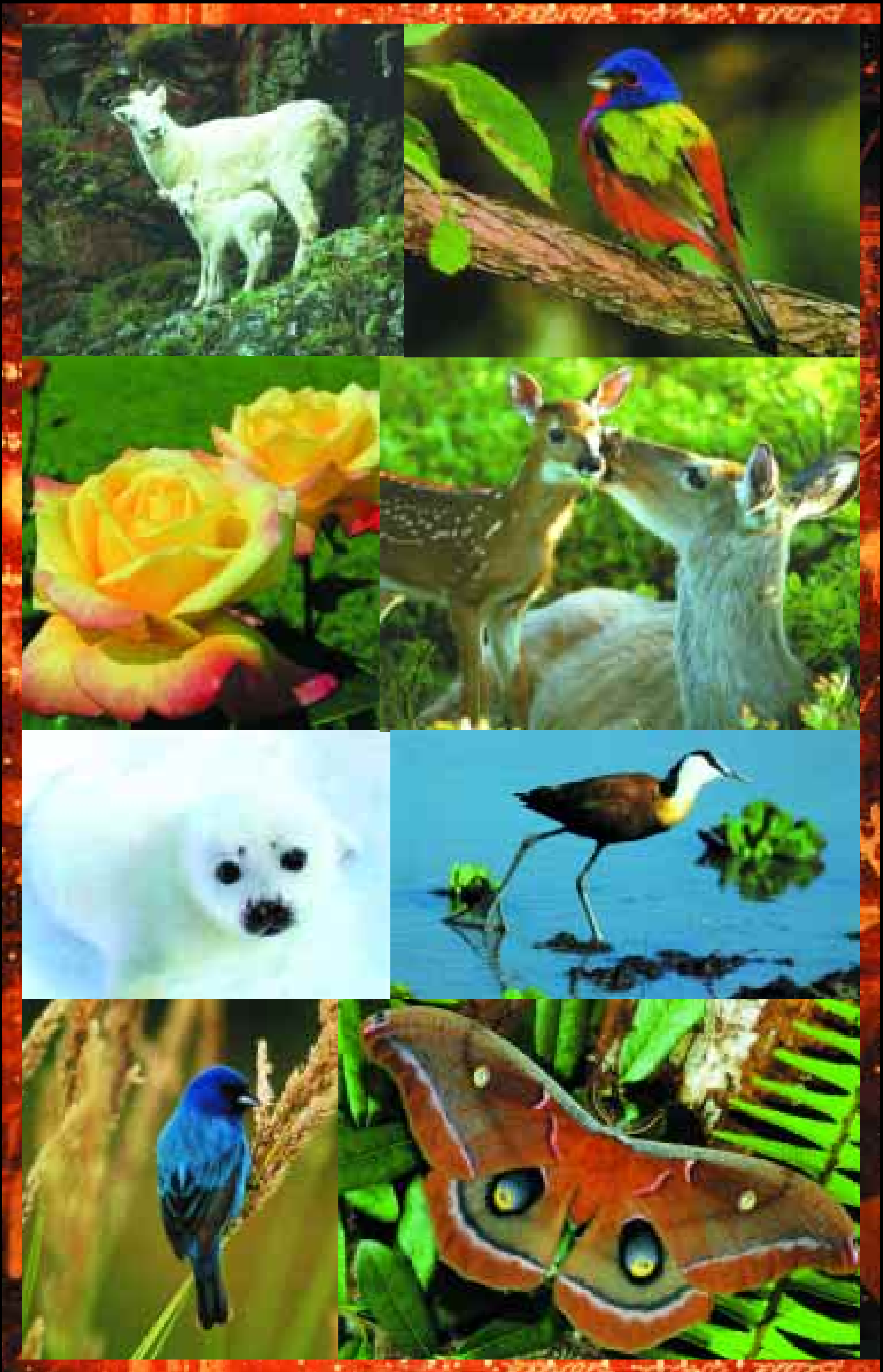
So, how did these creatures come into being?

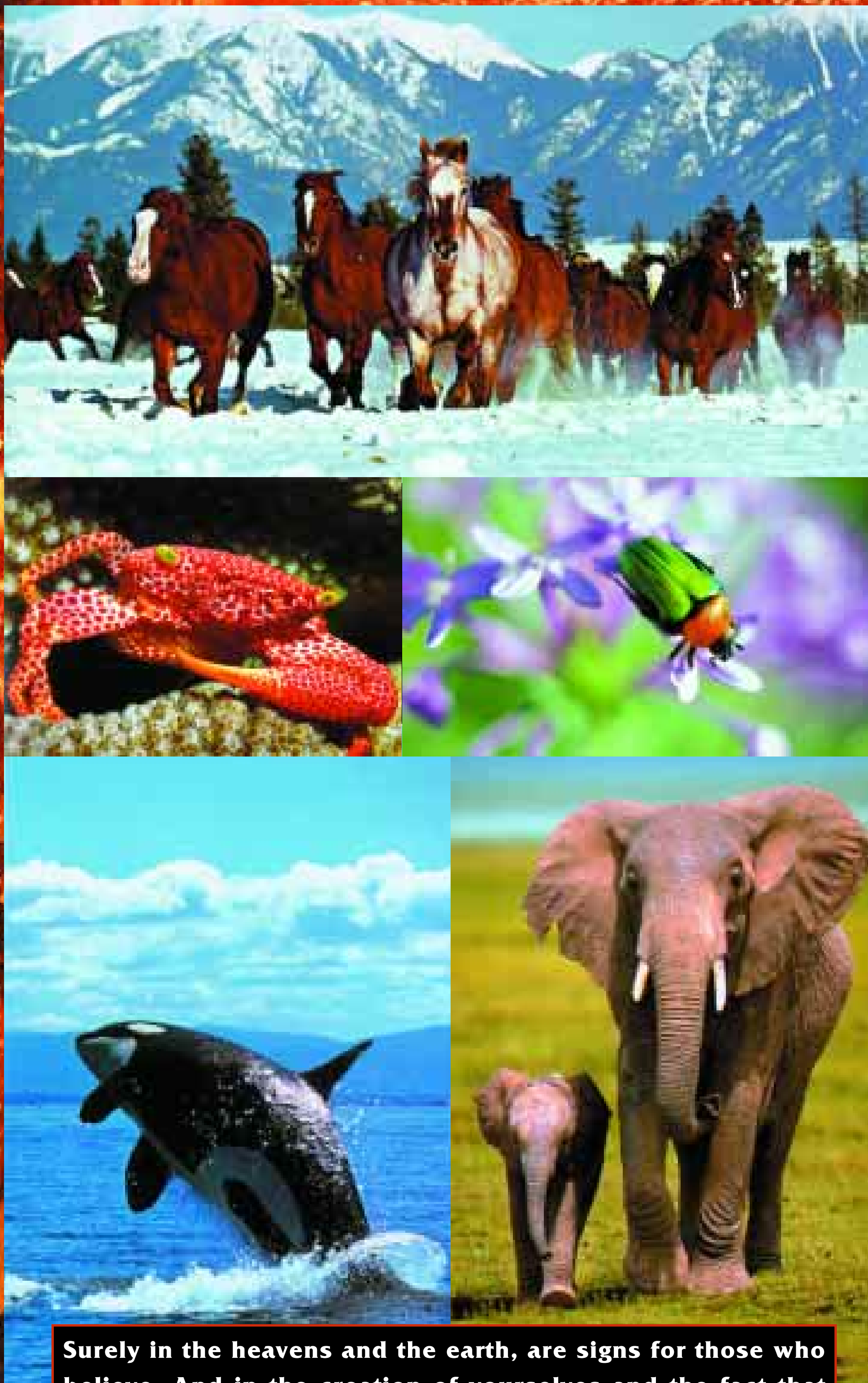
Anyone who reflects upon this question, employing the faculty of his reason, would see that all living things are designed, that is, created. Every design proves the existence of an intelligent designer that has produced it. Living things, just as all other examples of design in nature, prove the existence of God.

This truth has been revealed to us through Islam. In the Qur'an, we are informed how living things came into being: All living species were



And God has created every animal from water: of them there are some that creep on their bellies; some that walk on two legs; and some that walk on four. God creates what He wills for, surely, God has power over all things. (Surat an-Nur: 45)





Surely in the heavens and the earth, are signs for those who believe. And in the creation of yourselves and the fact that animals are scattered (through the earth), are signs for those of assured faith. (Surat al-Jathiyyah: 3-4)



created distinctively by God. God, with His unique creative power and infinite knowledge, equipped creatures with diverse features, and thus communicated His infinite power, wisdom and knowledge to humanity. Some of the verses that refer to the creation of living things read:

And among His signs is the creation of the heavens and the earth, and the living creatures that He has scattered through them: and He has power to gather them together when He wills. (Surat ash-Shura: 29)

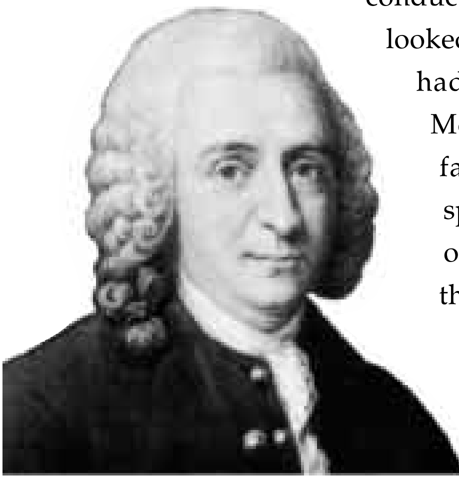
And God has created every animal from water: of them there are some that creep on their bellies; some that walk on two legs; and some that walk on four. God creates what He wills for, surely, God has power over all things. (Surat an-Nur: 45)

He created the heavens without any pillars that you can see; He set on the earth mountains standing firm, lest it should shake with you; and He scattered through it beasts of all kinds. We send down rain from the sky, and produce on the earth every kind of noble creature, in pairs. Such is the Creation of God: now show Me what is there that others besides Him have created: no, but the transgressors are in manifest error. (Surah Luqman: 10-11)

Surely in the heavens and the earth, are signs for those who believe. And in the creation of yourselves and the fact that animals are scattered (through the earth), are signs for those of assured faith. (Surat al-Jathiyyah: 3-4)

Having recognized the reality of creation, scientists established various disciplines, such as biology, anatomy, and paleontology. Noted scientists, like Carl Linnaeus, who categorized the living world under definite classes, and who is known as "the founder of taxonomy"; Georges Cuvier, the founder of fossil science and comparative anatomy; Gregor Mendel, the founder of genetics who discovered the laws of inheritance; or Louis Agassiz, who is considered the greatest American biologist of the 19th century, **all practiced science with an awareness that all living species were created by God**.

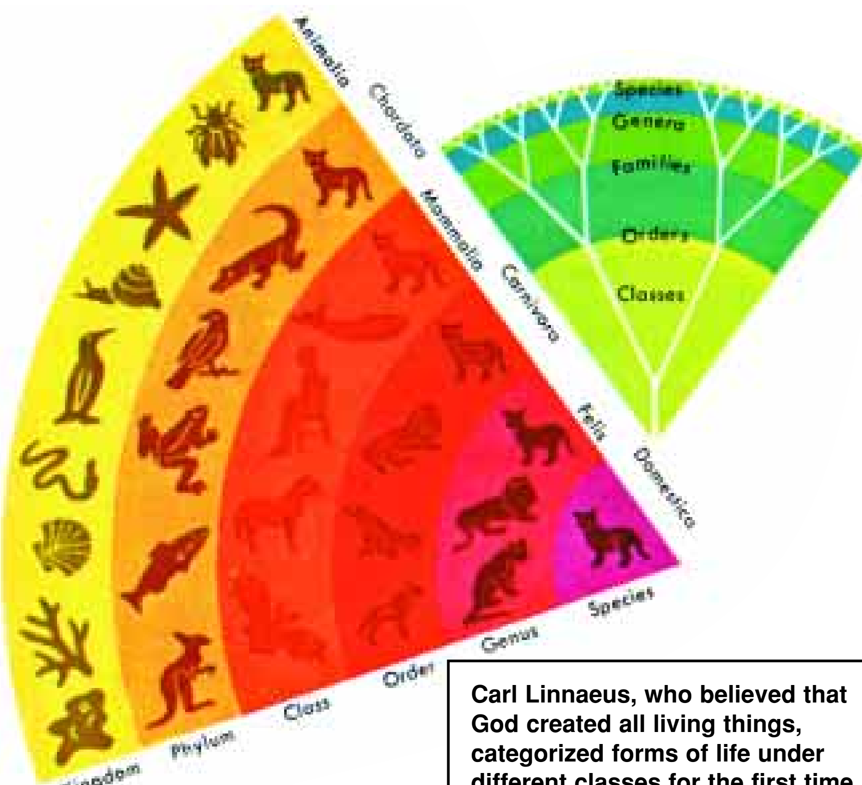
Then, with the introduction of Charles Darwin's theory of evolution, the world of science became immersed in an effort to prove that "species evolved from one another". This endeavor caused scientists to engage themselves in a number of fruitless investigations. In fossil excavations



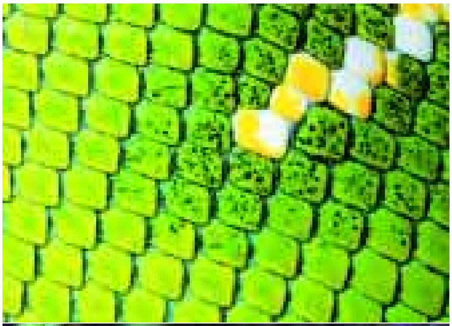
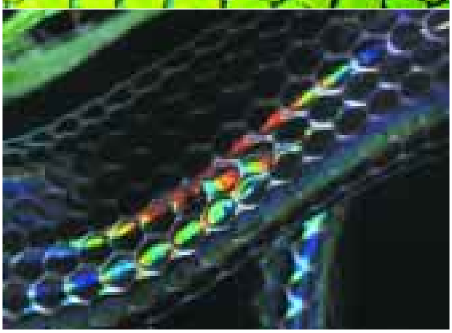
Carl Linnaeus

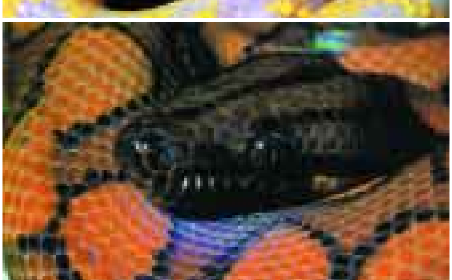
conducted all around the world, scientists looked for intermediate form fossils that had existed at no time in history. Moreover, imaginary scenarios were fabricated to explain how certain species could have evolved into each other. Science journals published these scenarios, and eventually, these were taught to students in schools.

It will be helpful to quote some of these scenarios, to demonstrate how evolutionists **subject science to their wild fantasies**. For instance, the following story was printed in an evolutionist article,



Carl Linnaeus, who believed that God created all living things, categorized forms of life under different classes for the first time, and was the founder of taxonomy.

regarding the transition of reptiles into mammals:

Some of the reptiles in the colder regions began to develop a method of keeping their bodies warm. Their heat output increased when it was cold and their heat loss was cut down when scales became smaller and more pointed, and evolved into fur. Sweating was also an adaptation to regulate the body temperature, a device to cool the body when necessary by evaporation of water. But incidentally the young of these reptiles began to lick the sweat of the mother for nourishment. Certain sweat glands began to secrete a richer and richer secretion, which eventually became milk. Thus the young of these early mammals had a better start in life.[20]

In order to substantiate this evolutionary hypothesis, it was necessary to scientifically prove

The claim that reptiles evolved into mammals is at definite odds with the discoveries of science. Evidence includes the significant differences between reptile scales and mammal fur.

impossible occurrences, such as the transition of sweat into milk, and scales into fur, causing thousands of scientists to waste their time trying to verify the claim. In reality, none of these transitions is possible. Mainly, it is impossible for mother's milk, which contains everything a baby



Bird feathers are completely different from reptile scales, and are equipped with extremely complex properties to enable birds to fly.

needs, to have evolved from "sweat", as claimed above. Mother's milk is a substance specially regulated according to the needs of a baby, and it is moderated depending on each phase within a plan. Everything a baby needs is found in the mother's milk just when it needs to be. For instance, the day the baby needs potassium, is the same as the day the mother's milk is rich in potassium. This specialization is true for all the other materials the baby needs throughout its development. It is obviously impossible for such a nutriment to have formed by unconscious coincidences.

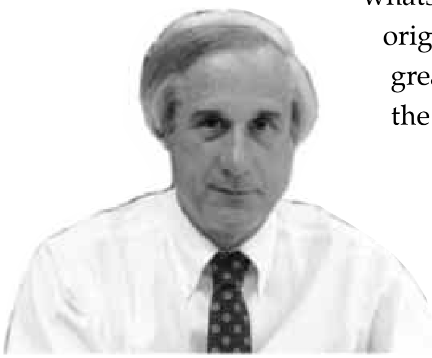
By the same token, the other component of the above claim, the story of "the evolution of reptile scales into mammal furs", is clearly at odds with scientific facts. Scales and fur have completely different structures:

1. Fur is follicular; that is, it grows out of a sac. Scales, on the other hand, are plate-like structures within the skin. In addition, scales develop, grow and are shed in a completely different way from that of fur. They definitely have nothing in common.

2. There is no scientific evidence suggesting that fur evolved from scales. Evolutionists have no fossil evidence to prove this claim, just as they can put forth no logical mechanism to account for this transformation.

This is not the only unscientific "tale" put forth as to the imaginary transformation of reptiles into mammals. Every evolutionist has a "story" of his own. Similarly, quite a few imaginary scenarios have been produced as to how dinosaurs evolved into birds. One of these scenarios holds that some dinosaurs started to fly as they chased flies. Another argues that dinosaurs developed wings as they jumped from one tree to the next. Finally, science was wont to "prove" these scenarios produced by the imagination of the evolutionists. Thus far, a great number of scientists have conducted research into how dinosaurs could have started to fly as they ran or jumped from tree branches, and spent years to show how scales turned into bird feathers. Well-known evolutionist and ornithologist, Alan Feduccia, is one of these scientists, who spent his life working on the subject. Having spent 25 years searching for a link between dinosaurs and birds, Feduccia offered the following confession:

Well, I've studied bird skulls for 25 years and I don't see any similarities



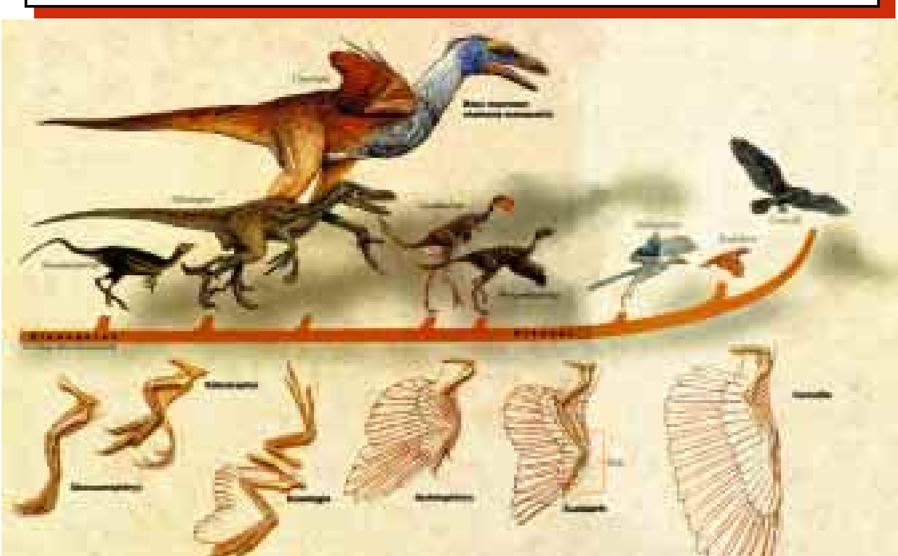
Alan Feduccia

whatsoever. I just don't see it... The theropod origins of birds, in my opinion, will be the greatest embarrassment of paleontology of the 20th century.[21]

Evolutionist scenarios are not limited to these. Just as evolutionist paleontologist Dr. Colin Patterson admitted, "There have been **an awful lot of stories, some more imaginative than others,** about what the nature of that history [of life] really is."[22] Evolutionists also put forth the fantastic claim that sea mammals, like whales and dolphins, evolved from bears that liked swimming. What's more, in order to provide a basis for this scenario, they have produced theories about half-bear/half-whale creatures, and even fabricated stories of "walking whales".

Evolutionists are free to dream and believe in any scenario they wish. The real problem is that they waste the science-world's resources and time

Evolutionists claim that the front legs of some dinosaurs transformed into wings as they chased flies. Evolutionists do not hesitate to produce such imaginary, and essentially, preposterous theories.



in the hope of proving these scenarios. As another renowned evolutionist scientist, Pierre Paul Grassé, said, regarding these evolutionary scenarios, "There is no law against daydreaming, but science must not indulge in it."[23]

Science will continue to hopelessly pursue such myths, as long as scientists base their studies on incorrect hypotheses such as Darwinism. The acknowledgment of the reality of creation, on the other hand, will put an end to all these vain endeavors, which inhibit the progress of science. As we have mentioned earlier, **all living things were created individually by God**. Their physical characteristics, feeding habits, hunting techniques, defense tactics, the way they foster their young etc., all reflect perfect harmonies. There is no point in claiming and trying to prove that these harmonies could have come about by chance. This perfection could not have come into being haphazardly; it could only have come about through the power and control of our Lord, the supreme Creator. Therefore, it would be much more worthwhile to investigate verifiable realities and their details, rather than producing completely imaginary scenarios. Most importantly, research with such an intent would help us to better know God, the Almighty, Who created human beings and the entire universe from nothing.

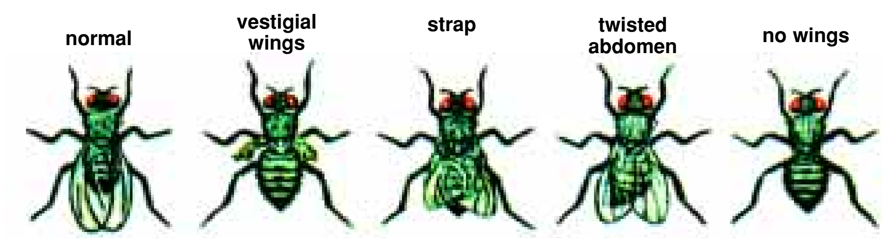
Mutation Impasse

Another assertion of the evolutionary theory which has wasted the science's time, was the delusive pursuit for "beneficial mutations". Mutations are changes that take place in the genetic code of an organism through the effect of radiation or chemicals. Though evolutionists claim that living things evolved through mutations, mutations are almost always harmful, and do not have an effect other than causing disorders in organisms. The radiation leakage in Chernobyl is an indication of the harmful effects of mutation. In the aftermath of this disaster, many people suffered illnesses such as leukemia, and serious disorders such as birth abnormalities.

Despite the negative effects of mutation, neo-Darwinism has put forth two concepts as "evolutionary mechanisms", one of which is mutation.

Therefore, scientists were bent on proving that mutations could create beneficial effects on living things as far as the theory of evolution is concerned. However, as we have explained above, mutations are always harmful, and have never been observed to have an evolutionary effect.

Evolutionists tenaciously devised artificial mutation models, and worked for decades to observe a beneficial mutation. For instance, fruit flies were mutated numerous times, with the hope that they would give rise to "a mutation improving the genetic code". The result was an utter





Mutation experiments carried out on fruit flies for decades did not produce even a single beneficial mutation. This is only one of the hopeless attempts of evolutionists in their search for beneficial mutations.

This physical disorder is an example to the deleterious effects of mutations. Random mutations only render harm to a perfect structure.



fiasco. Evolutionist Michael Pitman made the following remark about these extensive, albeit, inconclusive, mutation experiments:

> Morgan, Goldschmidt, Muller, and other geneticists have subjected generations of fruit flies to extreme conditions of heat, cold, light, dark, and treatment by chemicals and radiation. All sorts of mutations, practically all trivial or positively deleterious, have been produced. Man-made evolution? Not really: Few of the geneticists' monsters could have survived outside the bottles they were bred in. In practice mutants die, are sterile, or tend to revert to the wild type.[24]

Renowned evolutionist, Gordon Taylor, also stated that 50 years were lost to mutation experiments.

> In all the thousands of fly-breeding experiments carried out all over the world for more than fifty years, a distinct new species has never been seen to emerge... or even a new enzyme.[25]

Evolutionary arguments in other scientific areas have been no different. Nevertheless, evolutionists advocate Darwinism despite all scientific evidence, and then present their persistence as "scientific perseverance". What they practice, however, is **not scientific perseverance, but resistance to science**.

Fossil Impasse

Another example of the time-loss the evolutionary theory caused science is the blind alley paleontology was pushed into. There is no doubt that paleontological studies are essential to enlightening us about the history of life on the earth. The erroneous preconceptions of the evolutionary theory, however, have had a negative effect on fossil research and misled scientists. In particular, some paleontologists investigating



Richard Leakey and Alan Walker. Two scientists who have been searching for evidence of evolution in the field of paleontology for years, having spent much of their lives to this end. Both evolutionists have not yet been able to find what they have been looking for.

the "origin of man" are caught in a quandary: all research carried out to discover a half-ape/half-human creature has been a complete waste of time.

It must be mentioned that fossil excavations are carried out under very difficult conditions and require large budgets. Excavations conducted for the last 1,5 centuries, in regions such as African deserts, by crowded teams of researchers, maintaining camps for months under the scorching sun, and with budgets over billions of dollars, have not presented any concrete results. Well-known fossil researcher, Richard Leakey, and renowned science writer, Roger Lewin, made the following confession regarding the inconclusiveness of these studies:

> If someone went to the trouble of collecting into one room all the fossil remains so far discovered of our ancestors (and their biological relatives) who lived, say, between five and one million years ago, he would need only a couple of large trestle tables on which to spread them out. And if that were not bad enough, a not unusually commodious shoe box would be more than sufficient to accommodate the hominid fossil finds of between fifteen and six million years ago![26]



"Excavations carried out to find evidence for evolution" in the African deserts under the scorching sun, with million dollar budgets, have all proved inconclusive and essentially useless. Evolutionists who did not want to see their efforts wasted, in desperation, resorted to "fraud".

All these were a waste of time, knowledge, labor, money and resources, mistakenly undertaken under the guise of "science". All around the world, thousands of universities, scientific institutions and organizations, millions of scientists, instructors and students, laboratories, technicians, technical equipment and numberless resources, have been consecrated to the service of a false allegation. The end result is literally nothing, and, moreover, new discoveries continue to expose the fallacy of the evolutionary hypothesis. Evolutionist scientist, S.J. Jones, explains, in an article published in *Nature* magazine, the predicament of paleoanthropology, the study of fossil research into the origin of man:

> Palaeoanthropologists seem to make up for a lack of fossils with an excess of fury, and this must now be the only science in which it is still possible to become famous just by having an opinion. As one cynic says, in human Paleontology the consensus depends on who shouts loudest.[27]

The Losses Those Who Deny "The Perfect Design in Nature" Caused Science

To deny the fact of creation, that is to say, "design" in nature, actually means inhibiting scientific research. A scientist who is aware of the

existence of a design in nature embarks on his studies with the aim of investigating this design and its purpose. An evolutionist, however, would not have that objective, as he considers nature to be a purposeless collection of matter.

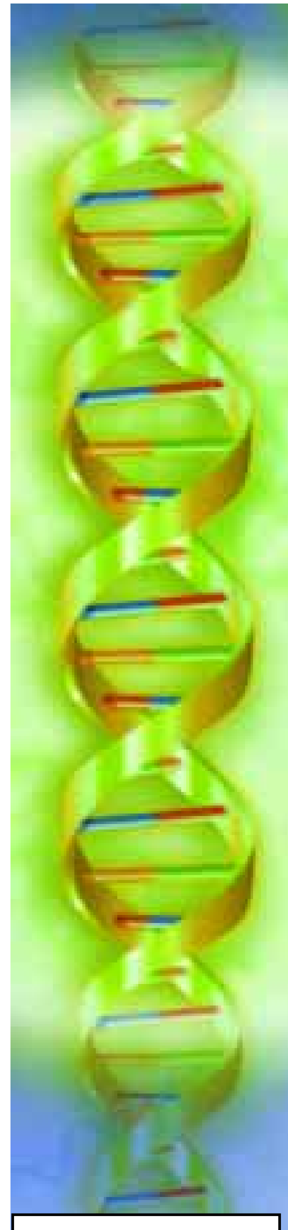
American physicist and philosopher, William Dembski, is another scientist who maintains that there is a "design" in nature. Dembski states that the evolutionary viewpoint, by denying the existence of a purpose in nature, holds back scientific progress. He quotes the evolutionists' term "junk DNA" as an example. (According to a hypothesis of evolutionist scientists, "junk DNA" are components of DNA that do not include any genetic information and therefore have no apparent genetic function). Dembski remarks:

> …Design is not a science stopper. Indeed, design can foster inquiry where traditional evolutionary approaches obstruct it. Consider the term "junk DNA." Implicit in this term is the view that because the genome of an organism has been cobbled together through a long, undirected evolutionary process, the genome is a patchwork of which only limited portions are essential to the organism. Thus on an evolutionary view we expect a lot of useless DNA. If, on the other hand, organisms are designed, we expect DNA, as much as possible, to exhibit function. And indeed, the most recent findings suggest that designating DNA as "junk" merely cloaks our current lack of knowledge about function. For instance, in a recent issue of the *Journal of Theoretical Biology*, John Bodnar describes how "non-coding DNA in eukaryotic genomes encodes a language which programs organismal growth and development." Design encourages scientists to look for function where evolution discourages it…
>
> Admitting design into science can only enrich the scientific enterprise. All the tried and true tools of science will remain intact. But design adds a new tool to the scientist's explanatory tool chest. Moreover, design raises a whole new set of research questions. Once we know that something is designed, we will want to know how it was produced, to what extent the design is optimal, and what is its purpose.[28]

Obviously, awareness of the fact that living things are created by God opens new avenues for science, as well as contributing to a better understanding of nature.

However, materialist scientists, denying God's creative power, claim that all the life-forms in nature came about as a result of haphazard events. In their view, the existence of "aberrant designs" or "unnecessary products" is quite natural in a universe which is the work of coincidence. Through the years, this flawed point of view has caused an improper interpretation of much scientific data, and prevented the discovery of numerous facts. For instance, a materialist scientist examining a bird feather he discovered in nature decides, looking at the asymmetric structure of the feather, that it has a distorted form because it came about by chance. Therefore, he does not feel the need to study the asymmetric structure of the feather. For a scientist who believes that God created every life-form for a specific purpose, and with a perfect design, however, the asymmetric pattern of a bird's feather is an important trait worthy of examination. A scientist who begins with such a premise will soon see that the asymmetric form of bird feathers is necessary for flight, and that birds with symmetric feather forms are unable to fly.

Such examples are common in the world of science. Scientists who studied honeybees had a similar experience. Certain scientists, after calculating the angles formed by the honeybees to join the honeybee cells, determined that two angles formed by honeybees differed from the optimum angle by 0,020. (Measurements showed that angles formed by bees are 109.28 and 70.32 degrees.



The complex make-up of DNA, with each of its properties having a specific purpose, demonstrates that DNA was created.



The behavioral patterns of honeybees are so complex that scientists have been discovering the purposes of that behavior only recently.

By very intricate calculation, it was determined by the mathematician Konig, that the optimum angles for such a purpose should be 109.26 and 70.34). Scientists working on the subject came to the conclusion that honeybees were at fault by this minute fraction. The Scottish mathematician Colin Maclaurin (1698-1746), not satisfied with this explanation, applied himself to a fresh and careful investigation of the question. He showed that, owing to a slight misprint in the logarithmic tables, the result previously obtained was errant to the exact amount of two minutes of a degree.[29] So, it was revealed that bees had calculated the optimum angle correctly, and not the scientists!

A person who is aware that God created all living things in a perfect form never supposes that there is an aberration in the design of an object of nature. He knows that every detail is created by God for a specific purpose.

Another misconception, adhered to by scientists who do not believe in the flawless creation of God, has again to do with honeybees. The 12 October 1996 issue of *New Scientist* contains a piece by Ben Crystall, where he maintains that honeybees beat their wings excessively, and therefore, their flight is inefficient. According to this article, honeybees beat their wings sometimes rapidly and sometimes slowly, yet fly at the same speed,

and therefore they waste energy when they beat frequently. According to the writer, this was a failure in design.

A team led by Jon Harrison, of Arizona State University, has published research findings in *Science* (1996, vol. 274, p. 88) which suggest that there are good reasons for the differences in the wing-beat frequencies of honeybees. As the temperature of the environment was changed, the bee's body temperature, the rate of its wing-beats, and its metabolic rate was measured. As the temperature rose from 20 to 40 degrees C, the wing-beat frequency decreased. Research revealed that honeybees beat their wings less frequently in hot weather, whereas they beat them more frequently in cold weather. Yet, there was no change in their flight speeds. They were keeping their body and hive warm with the energy output they generated by beating their wings more frequently in cold weather. Ultimately, it was revealed that wings of honeybees had a dual function: flying and generating heat.

Another sophistry put forward by evolutionist scientists, who do not believe that God created living things distinctly and perfectly in their present forms, is the fallacy of "vestigial organs". Evolutionists, who argue that all living things evolved from a predecessor by chance, believe that there existed a number of "non-functional organs" in the human body, inherited from progenitors which had become vestigial over time by not being used. Scientists who do not believe in the creative attribute of God, caused a great deal of harmful confusion in the scientific study of these organs, which they assumed to be nonfunctional. As science progressed, it was understood that these supposedly nonfunctional organs are actually vital for the human body. The gradual decrease in evolutionists' long list of vestigial organs was the best indication of how flawed was this premise, that had impeded the progress of science. S.R. Scadding, an evolutionist himself, concurred with this fact in his article, titled "Can vestigial organs constitute evidence for evolution?", published in the magazine *Evolutionary Theory*:

> Since it is not possible to unambiguously identify useless structures, and since the structure of the argument used is not scientifically valid, I conclude that "vestigial organs" provide no special evidence for the theory of evolution.[30]

The list of vestigial organs compiled by the German anatomist R. Wiedersheim, in 1895, comprised of approximately 100 organs, including the appendix and coccyx. With the advancement of science, the number of organs in Widersheim's list gradually decreased, and it was discovered that these organs had in fact very important functions in the body. For instance, it was discovered that the appendix, which was supposed to be a "vestigial organ", was actually a lymphoid organ that fought against infections in the body. It was also discovered that the tonsils, which were included in the same list of vestigial organs, had a significant role in protecting the throat against infections, particularly until adolescence. It was found that the coccyx, at the lower end of the vertebral column, supports the bones around the pelvis, and is the converging point of certain small muscles. In the years to follow, it came to be understood that the thymus instigated the immune system in the human body by activating the T cells, that the pineal gland was in charge of the secretion of some important hormones, and the functions of many other supposedly non-functional organs were discovered. The semi-lunar fold in the eye, that was referred to as a vestigial organ by Darwin, is in fact in charge of cleansing and lubricating the eyebrow.

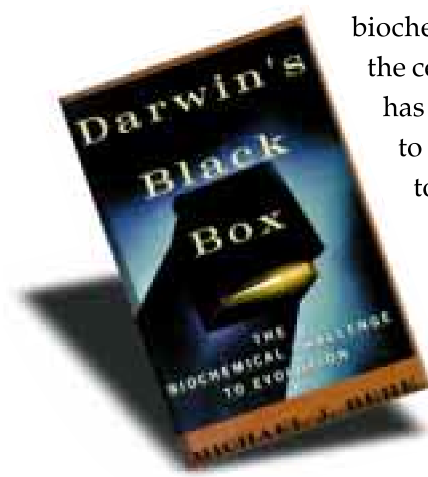
All of these examples point to one fact: in order for scientific research to be effective and expeditious, it must be founded on a correct premise. God created everything for a certain purpose, with a flawless and inimitable design. Therefore, the ultimate goal of a scientist investigating nature should be to discover the details of this perfection in all things, and explore the hidden purposes of every phenomenon he encounters.

The Negative Effects on Evolutionist and Atheist Scientists From Knowing that Their Efforts Are In Vain

In fact, conducting extensive research and study of fallacious and inconclusive hypotheses, is also emotionally draining for evolutionist scientists. When they come to understand that a majority of the research to which they have devoted their lives is futile and useless, they feel great despair. Conducting scientific research requires great discipline and self-

sacrifice. Carrying out long drawn-out experiments and observations in the laboratory, for a premise which they know will come to nothing, and only to discover that the direct opposite of the hypothesis they want to prove is correct, is certainly quite upsetting for such scientists.

In his book, *Darwin's Black Box*, where he discusses the scientific invalidity of Darwinism, noted American biochemist, Michael Behe, describes the psychology of the evolutionist scientists confronted by the reality of "design" apparent in the living cell:



Over the past four decades modern biochemistry has uncovered the secrets of the cell. The progress has been hard won. It has required tens of thousands of people to dedicate the better parts of their lives to the tedious work of the laboratory… The result of these cumulative efforts to investigate the cell – to investigate life at the molecular level – is a loud, clear, piercing cry of "design!" The result is so unambiguous and so significant that it must be ranked as one of the greatest achievements in the history of science. This triumph of science should evoke cries of "Eureka" from ten thousand throats.

But, no bottles have been uncorked, no hands clapped. Instead, a curious, embarrassed silence surrounds the stark complexity of the cell. When the subject comes up in public, feet start to shuffle, and breathing gets a bit labored. In private people are a bit more relaxed; **many explicitly admit the obvious but then stare at the ground, shake their heads, and let it go like that.** Why does the scientific community not greedily embrace its startling discovery? Why is the observation of design handled with intellectual gloves? The dilemma is that while one side of the [issue] is labeled intelligent design, the other side must be labeled God.[31]

Some evolutionists in the scientific community have admitted to suffering such desperation. For instance, evolutionist paleontologist, Dr.

Colin Patterson, the senior paleontologist of the British Museum of Natural History, and also the author of the book titled *Evolution*, made the following famous comments in an address he made at the opening of the Museum of Natural History in New York:

> Question is: Can you tell me anything you know about evolution, any one thing that is true? I tried that question on the geology staff at the Field Museum of Natural History and the only answer I got was silence… Then I woke up and realized that all my life I had been duped into taking evolutionism as revealed truth in some way. [32]

Somewhere else in the same speech, Patterson also noted:

> One of the reasons I started taking this anti-evolutionary view, or let's call it a non- evolutionary view, was last year I had a sudden realization for over twenty years I had thought I was working on evolution in some way. One morning I woke up and something had happened in the night and it struck me that I had been working on this stuff for twenty years and there was not one thing I knew about it. **That's quite a shock to learn that one can be so misled so long.**[33]

Evolutionist, Dr. N. Heribert-Nilsson, Director of the Botanical Institute at Lund University, Sweden, confessed to having wasted **over 40 years** for nothing, saying, "My attempt to demonstrate evolution by an experiment carried on for more than 40 years has completely failed."[34]



A great portion of the extensive efforts of evolutionist scientists has been for nothing. This outcome has certainly caused many scientists to lose their enthusiasm for research.

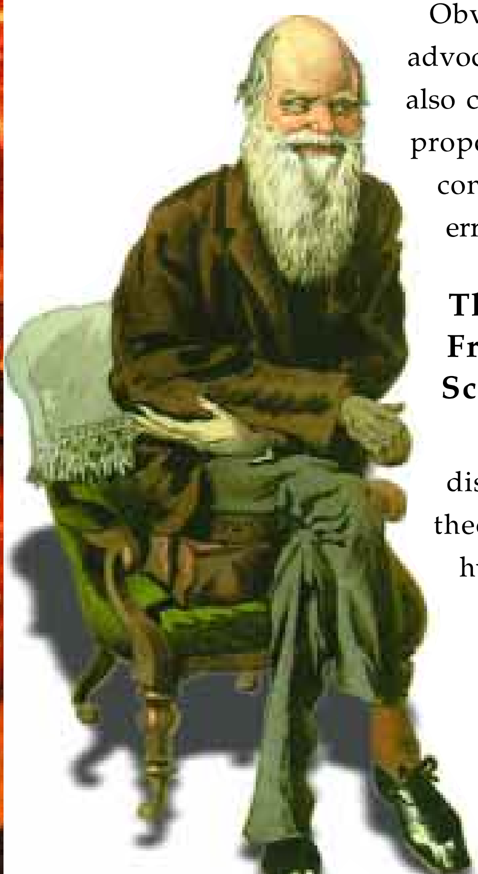
These individual examples show what science has suffered by pursuing a false theory. For decades, the knowledge, time, energy, work, laboratory, assistants and financial resources of thousands of scientists have been wasted in a bogus attempt to support the myth of evolution.

More interestingly, not only the evolutionists of our day, but also Charles Darwin, the founder of the theory, often fretted about **"spending his time for nothing"**, and that **"he will be disappointed at the end"**. Darwin repeatedly talked about his worries over this point in his letters to his friends or in his articles. In one of these, he confessed that there is no evidence in nature to support his theory:

All nature is perverse and will not do as I wish it.[35]

Darwin's lack of self-confidence is also manifest in his following words:

Nevertheless I doubt whether the work (of writing *The Origin of Species*) was worth the consumption of so much time.[36]



Obviously, a fallacious theory, if advocated purely for ideological reasons, also causes distress and desperation in its proponents. Such are the inevitable consequences of setting science on an erroneous course.

The Losses Evolutionist Frauds Have Caused For Science

As evolutionists were unable to discover evidence in support of their theory, now and then, they deceived humanity by distorting their scientific

Saying, "I doubt whether the work was worth the consumption of so much time", Darwin stated his lack of faith in his attempts to prove the theory of evolution.

findings and perpetrating hoaxes. The most notorious of these hoaxes was the **"Piltdown Man"** scandal. Unable to discover fossils of the supposedly half-ape/half-human creatures, which they alleged to have existed, evolutionists finally decided to produce one themselves. By mounting an orangutan's jaw onto a human skull, and giving it a dated appearance by treating it with certain chemicals, for several years they exhibited the skull in the most famous museum of the world, as a "human ancestor". F. Clark Howell, an evolutionist himself, describes the detriment this fraud has caused for science as such:

> Piltdown was discovered in 1953 to have been nothing more than an Ape's jaw placed with a human skull. It was a hoax placed on purpose. They recognized neither the jaw to be an ape's or the skull to be a human's. Instead, they declared each part as an in between of ape and human. They dated it to be 500,000 years old, gave it a name (Eoanthropus Dawsoni or 'Dawn Man'), and **wrote some 500 books on it. The 'discovery' fooled paleontologists for forty five years.**[37]

The words of this scientist are truly remarkable. A false piece of "so-called evidence" "fooled" the scientific community for **40 years**. The fact that **500 books** were written about a fraudulent skull is a glaring indication of effort expended for naught.

The perpetrator of another evolutionary fraud, Ernst Haeckel, not only confessed to his forgery, but also referred to the distortions committed by his colleagues in order to perpetuate their various ideologies:

> After this compromising confession of "forgery" I should be obliged to consider myself condemned and annihilated if I had not the consolation of seeing side by side with me in the prisoners' dock hundreds of fellow culprits, among them many of the most trusted observers and most esteemed biologists. The great majority of all the diagrams in the best biological



The false skull used in the Piltdown man hoax.

> textbooks, treatises and journals would incur in the same degree the charge of "forgery", for all of them are inexact, and are more or less doctored, schematised and constructed.[38]

Attempts to make observations, experiments and research concur with evolution, the covering-up of the truths, or their distorted presentation, has certainly been a serious impediment to scientific progress. The evolutionist writer W.R. Thompson admitted to that fact, though indirectly, with these words:

> This situation where scientific men rally to the defense of a doctrine they are unable to define scientifically, much less demonstrate with scientific rigor, attempting to maintain its credit with the public by suppression of criticism and the elimination of difficulties, is **abnormal and undesirable in science**.[39]

The most interesting thing is that all the studies and experiments evolutionists make to prove evolution ultimately yield evidence that supports the fact of creation.

Scientific Findings Always Prove the Fact of Creation Though Evolutionist Do Not Like It

As mentioned at the beginning of this chapter, when science is guided by erroneous ideologies, time, money and labor are spent wastefully. Since the 18th century, science has been under the influence of materialists, and almost all research was intended to provide scientific evidence for the materialist philosophy. Therefore, scientific evidence discounting the materialist philosophy was either covered up or presented in a distorted manner.

Moreover, every study and experiment made by evolutionists to prove evolution produced further evidence in support of creation. Science is relatively simple and trouble-free for those who believe in God's existence. Investigating a phenomenon known to exist, and looking for evidence for it, would cause no trouble for scientists. On the contrary, to seek out non-existent evidence is **"tedious"** and **"annoying"**, as they themselves attest.

One of the most blatant examples of this is the paleontological findings

of the Cambrian Period. This is the name given to the period which is estimated to date back 550 million years, and at which the first signs of life have been observed. All of the life-forms that existed in this period were fully developed creatures possessing highly complex systems. For instance, an extinct creature called the trilobite possesses a complicated compound eye structure. Comprised of 100 lenses, this eye structure is the same as that of some modern insects such as the dragonfly. What is "troublesome" for the evolutionists is that these creatures, exhibiting such complex structures, appear in this stratum all of a sudden and without any ancestors. These scientific facts clearly point to Creation.

This is how renowned evolutionist scientist, British zoologist Richard

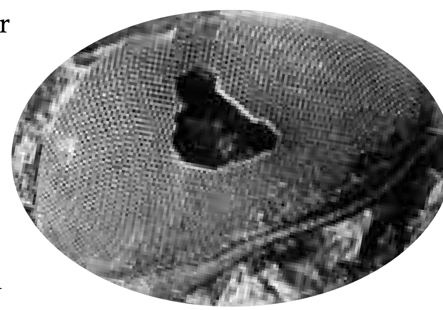


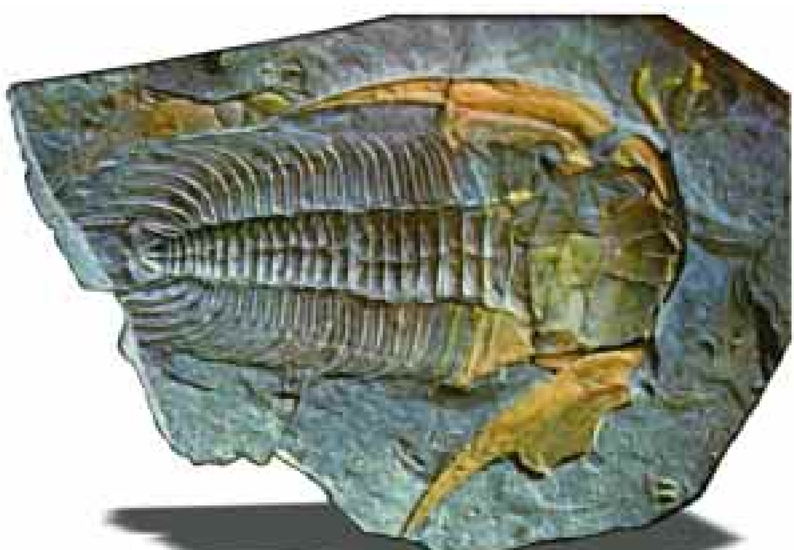
No matter how hard evolutionists try to prove the contrary, every scientific discovery points to the existence of God and the subtleties of His creation. The complex forms of life that suddenly appeared in the Cambrian period are proof of this creation.

Dawkins, assesses how scientific discoveries are consistently in support of the fact of creation:

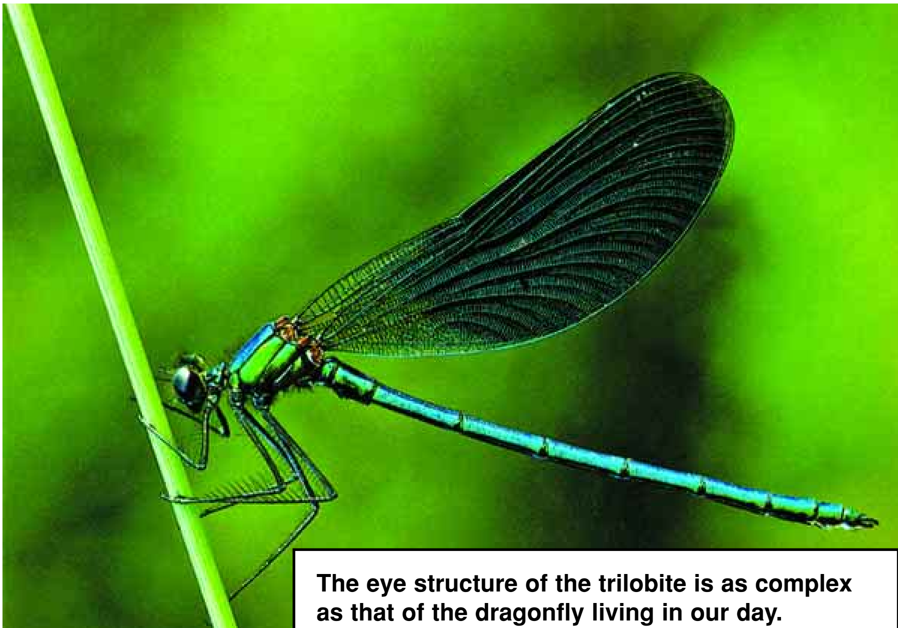
> For example the Cambrian strata of rocks, vintage about 600 million years, are the oldest ones in which we find most of the major invertebrate groups. And we find many of them already in an advanced state of evolution, the very first time they appear. It is as though they were just planted there, without any evolutionary history. Needless to say, **this appearance of sudden planting has delighted creationists.**[40]

This state of "inconclusiveness" in the field of paleontology is one of the gravest impasses to encumber the evolutionary theory. As we have repeatedly stated, evolutionist scientists have expended their best efforts for decades to find transitional forms (a supposed animal in between two different species) that will provide evidence of evolution. Yet, they have never achieved any concrete results, because such





The trilobite fossil of the Cambrian, and the intricate features of its compound eye, are evidence of creation.



The eye structure of the trilobite is as complex as that of the dragonfly living in our day.

creatures have never existed on the earth. Evolutionist paleontologist, Mark Czarnecki, makes the following comment about the failure of evolutionists to find the fossils of transitional forms which they have been looking for:

> A major problem in proving the theory has been the fossil record; the imprints of vanished species preserved in the Earth's geological formations. This record has never revealed traces of Darwin's hypothetical intermediate variants **- instead species appear and disappear abruptly, and this anomaly has fueled the creationist argument that each species was created by God**.[41]

Reading between the lines of the statements of some evolutionists reveals that every endeavor to seek scientific justification for evolution has proved unsuccessful, and failed to lead to any definite conclusions. On the contrary, each study conducted by evolutionist scientists to confirm the notion that everything came into being through chance points to an irrepressible truth: **the reality that all living things are created flawlessly by God, the Lord of the heavens and the earth**.

Conclusion

Our immediate surroundings, and the universe we live in, teem with numerous signs of the fact of creation. Implicit in the fascinating system of a mosquito, the glorious artistry in the wings of a peacock, a complex and perfectly functioning organ like the eye, and millions of other forms of life, are signs of the existence of God, and His supreme knowledge and wisdom, for people who believe. A scientist who maintains that creation is a fact views nature from this perspective, and derives great pleasure in every observation he makes, and every experiment he conducts, gaining inspiration for further studies.

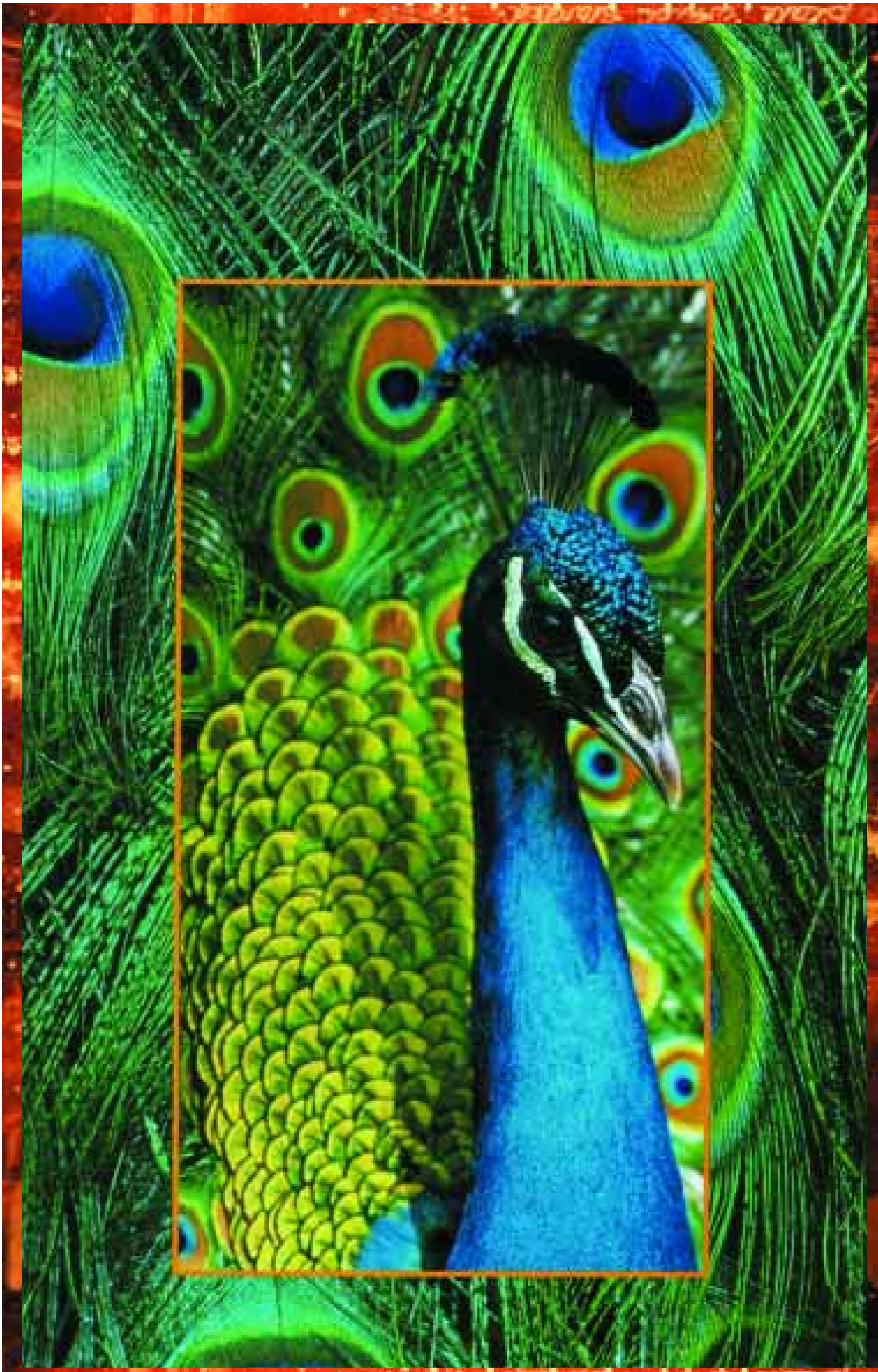
On the other hand, believing in a myth such as evolution, and adhering to it despite the findings of science, results in an emotional state of despair. The harmony in the universe and the design in living things becomes rather a great source of trouble to them. The following words of Darwin offer us a glimpse into the sentiments of most evolutionists:

> I remember well the time when the thought of the eye made me **cold all over**, but I have got over this stage of complaint... and now trifling particulars of structure often make me very uncomfortable. The sight of a feather in a peacock's tail, whenever I gaze at it, makes me sick![42]

The feathers of a peacock, as well as countless other signs of creation in nature, continue to discomfit evolutionists. Turning a blind eye to such apparent miracles, they develop an ambivalence to such truths, accompanied by a mental state of denial. A good case to this point is the prominent evolutionist Richard Dawkins, who goes so far as to call upon Christians not to assume that they have witnessed a miracle, even if they see the statue of the Virgin Mary waving to them. According to Dawkins, "Perhaps all the atoms of the statue's arm just happened to move in the same direction at once–a low probability event to be sure, but possible."[43]

In order for science to progress, these holdovers of the 19th century must be pushed aside, and free-thinking scientists bold enough to admit the facts they apprehend take their place.

The reason why the feathers of a peacock made Darwin "sick" was that they evidently imply the existence of a superior Creator.



RELIGION AND SCIENCE ARE ALWAYS IN AGREEMENT

Materialists, in an attempt to conceal their defeat by science, often take recourse through various propaganda methods. Foremost of them is the cliché of "the conflict between science and religion", commonly employed by materialist publications. These sources cover factitious stories, suggesting that throughout history religion has always been against science, and that science can progress only if religion is ruled out.

A quick look at the history of science, however, will be sufficient to point out the falsehood of this claim.

When we look at the history of Islam, we see that science was introduced into the Middle East along with the Qur'an. Pre-Islamic Arabs believed in all sorts of superstitions and hearsay, and conducted no investigation of the universe or nature. With Islam, this community became civilized, and, beginning to hold knowledge in high regard, and by observing the commands of the Qur'an, began to examine the world around them. Not only Arabs, but many other nations, such as the Iranians, Turks, and North Africans, became enlightened after embracing Islam. The use of reason and observation commanded in the Qur'an gave rise to a great civilization in the 9th and 10th centuries. Many Muslim scientists living during that period made significant discoveries in a number of disciplines, such as astronomy, mathematics, geometry, and medicine.

The importance given to knowledge in Islam is also obvious in the ahadith of our Prophet, God's Messenger, peace be upon him. There are numerous ahadith encouraging Muslims to seek knowledge and

disseminate it. Some of them read:

> One who proceeds on a path in the pursuit of knowledge, God makes him proceed therewith on a path to the Garden (Paradise)... The learned are the heirs of the prophets, for the prophets did not leave behind a legacy of wealth but that of knowledge. So whoever partakes of it derives a plenteous benefit.[44]

> A believer is never satiated with gainful knowledge; he goes acquiring it till his death and entry into Paradise.[45]

> It is narrated that the Prophet (pbuh) used to say after the dawn prayer, "O God, I ask You for beneficial knowledge, acceptable action, and good provision." [46]

Playing an important role in the transfer of scientific knowledge to Europe, as well as producing many Muslim scientists of her own, Andalusia was a crucible of revolutionary discoveries and scientific progress, particularly in the field of medicine. Muslim physicians did not specialize in a single subject, but conducted studies in a wide range of fields, including pharmacology, surgery, ophthalmology, gynecology, physiology, bacteriology and hygiene. One of the most noted Andalusian physicians was **Ibn Juljul** (?-992), who conducted extensive studies on medical herbs, and produced works on the history of medicine and medical herbs. Another distinguished physician of the time was **Abu Ja'far Ibn al-Jazzar** (?-1009) from Tunisia, who mastered the science of drug therapy for the treatment of specific symptoms and diseases, and

Only those of His servants with knowledge have fear of God. God is Almighty, Ever-Forgiving. (Surah Fatir: 28)

God bears witness that there is no deity but Him, as do the angels and the people of knowledge, upholding justice. There is no deity but Him, the Almighty, the All-Wise. (Surat Al 'Imran: 18)

authored more than 30 books. **Abd al-Latif al-Baghdadi** (1162-1231) is known for his studies in anatomy. He corrected the mistakes made in the past in anatomical studies of many bones of the body, such as the jaw and chest bone. Baghdadi's book, *Al-Ifade ve'l Itibar*, was re-published in 1788, and translated into Latin, German and French. His book *Makalatun fi'l Havas* covered the five senses.

Muslim anatomists determined the number of bones in the human skull correctly, and discovered the existence of three ossicles in the ear. One of the leading Muslim scientists working in anatomy was **Ibn Sina** (980-1037), known as Avicenna in the West. Instructed in literature, mathematics, geometry, physics, natural sciences, philosophy and logic, in his early years, Ibn Sina was not only widely known in the East, but also in the West. His most popular work, *al-Qanun fi al-Tibb*, known as the 'Canon' in the West, was written in Arabic, and after its translation into Latin in the 12th century, became the textbook of the schools of Europe until the 17th century. The Canon deals with diseases and drugs in a systematic manner. Apart from this, he wrote more than 100 books on philosophy and natural sciences. A significant portion of the medical knowledge included in the Canon is still accepted today.

Zakariya Qazwini countered many mistaken beliefs about the heart and the brain that had been professed since Aristotle. The facts he provided about the heart and the brain are very close to our knowledge of today.

The works in anatomy of Zakariya Qazwini, **Hamdullah al-Mustaufi al-Qazwini** (1281-1350), and **Ibn al-Nafis**, laid the foundation of modern medicine. These scientists demonstrated, as early as the 13th and 14th centuries, the connections between the heart and the lungs, that the arteries carry oxygenated blood, and the veins carry deoxygenated blood, that the blood is oxygenated in the lungs, and that the oxygenated blood that returns to the heart is carried to the brain and other organs of the body via the aorta.

The first volume of **Ali Bin Isa**'s (?-1038) three-volume work on the ophthalmologic diseases, called the *Tezkiratu'l Kahhalin fi'l Ayn* and *Emraziha*, is entirely devoted to the anatomy of the eye and includes very detailed information. The work was translated into Latin and German.



Al-Biruni was an 11th century Muslim scientist. He knew that the earth rotates about its own axis 600 years prior to Galileo, and determined the earth's circumference 700 years prior to Newton.

Muhammad ibn Zakariyya ar Razi (Rhazes) (865-925), **Burhan al-din Nafis**(?-1438), **Isma'il Jurjani** (?-1136), **Qutb al-Din al-Shirazi** (1236-1310), **Mansur ibn Muhammad**, **Abu al-Qasim al-Zahrawi** (Albucasis), are just some of the Muslim scientists noted for their studies in astronomy, mathematics, medicine and anatomy.

There were also many Muslim scientists who made great contributions to various disciplines other than medicine and anatomy. For instance, Al-**Biruni** knew that the earth rotates about its own axis, some 600 years prior to Galileo, and determined the earth's circumference some 700 years prior to Newton. **Ali Kushchu**, a 15th century scientist, was the first to make a map of the moon, and a region of the moon has been named after him. **Thabit ibn Qurrah** (Thebit), who lived in the 9th century, invented differential calculus centuries before Newton. **Battani**, a 10th century scientist, is the first developer of trigonometry. **Abul Wafa Muhammad al-Buzjani** introduced the "secant-cosecant" to trigonometry for the first time. **Al-Khwarizmi** wrote the first book on algebra in the 9th century. **Al-Maghribi** invented the equation known today as the Pascal triangle, some 600 years prior to Pascal. **Ibn al-Haitham** (Alhazen), who lived in the 11th century, was the founder of optics. Roger Bacon and Kepler made use of his works, and Galileo invented the telescope by referring to them. **Al-Kindi** (Alkindus) introduced relative physics and the theory of relativity some 1100 years prior to Einstein. **Shams al-din**, who lived some 400 years prior to Pasteur, was the first to discover the existence of germs. **Ali ibn al-Abbas** lived in the 10th century and was the first to perform cancer surgery. In the same century, **Ibn el Jessar** introduced the reasons and treatment methods of leprosy. These Muslim scientists, only some of whom are mentioned here, have made important discoveries that laid the foundation for modern science.

When we look at Western civilization, we see that the advent of modern science arrived with faith in God. The 17th century, known as the "Age of the Scientific Revolution", abounds with scientists **whose primary aim was the exploration of the universe and nature that God created**. All scientific institutes established in various countries, such as Britain and France, had as their main goal "coming nearer to God by discovering His



Ali Kushchu, a 15th century scientist, was the first to make a map of the moon, and a region of the moon has been named after him.

laws". This same trend made its way into the 18th century. Some of the scientists known for their devotion to God, and who made significant contributions to the world of science, were Newton, Kepler, Copernicus, Bacon, Galileo, Pascal, Boyle, Paley, and Cuvier, to name a few. (For further detail, please see the chapter "Scientists of Faith").

These scientists believed in God and practiced scientific research with an inspiration derived from their faith. One of the best indications of this was the "Bridgewater Treatises", a series of publications released in Britain in the early 19th century. A number of scientists conducted research on a variety of disciplines, and defined the object of their study to be **"the signs of the harmony and order God created in the universe and nature"**. The method employed by these scientists is referred to as "Natural Theology", meaning "knowing God through nature".

It was William Paley's *Natural Theology: Evidences of the Existence and Attributes of the Deity, Collected From the Appearances of Nature*, published in 1802, that pioneered the Bridgewater Treatises. In this book, Paley gave examples of design in living things, displaying a comprehensive knowledge of anatomy.

Taking Paley's work as a model, a call was made to the nominated members of the Royal Society of London. It was further directed that those so selected should be appointed to write, print, and publish one thousand copies of a work: "On the Power, Wisdom and Goodness of God as manifested in the Creation illustrating such work by all reasonable arguments as, for instance, the variety and formation of God's creatures, in the animal, vegetable and mineral kingdoms; the effect of digestion and thereby of conversion; the construction of the hand of man and an infinite variety of other arguments; as also by discoveries ancient and modern in arts, sciences, and the whole extent of modern literature."

This call to explore the signs of God's existence was answered by many scientists who produced highly valuable studies. Those works produced as a consequence were the following:

(1) "The Adaptation of External Nature to the Moral and Intellectual Constitution of Man", by Thomas Chalmers (1833)

(2) "Chemistry, Meteorology, and Digestion", by William Prout, M.D. (1834)

(3) "History, Habits, and Instincts of Animals", by William Kirby (1835)

(4) "The Hand, as Evincing Design", by Sir Charles Bell (1837)

(5) "Geology and Mineralogy", by Dean Buckland (1837)

(6) "The Adaptation of External Nature to the Physical Condition of Man", by J. Kidd, M.D. (1837)

(7) "Astronomy and General Physics", by Dr. William Whewell (1839)

(8) "Animal and Vegetable Physiology", by P. M. Roget, M.D. (1840).

The Bridgewater Treatises are only one example of the meeting of religion and science. The main thrust behind numerous scientific studies, conducted both before and after these works, was to know the universe God created, and thus perceive His almightiness.

The scientific community's deviation from this initial course was brought about by the predominance of the materialist philosophy in 19th century Western culture, that resulted due to certain social and political conditions. This process finds its fullest expression in Darwin's theory of evolution, culminating, in direct contradiction to the former view, in the presentation of science and religion as two bitterly conflicting sources of knowledge.

Referring to this development, British researchers, Michael Baigent, Richard Leigh and Henry Lincoln, make this comment:

> **For Isaac Newton, a century and a half before Darwin, science was not separate from religion but, on the contrary, an aspect of religion, and ultimately subservient to it.** …But the science of Darwin's time became precisely that, divorcing itself from the context in which it had previously existed and establishing itself as a rival absolute, an alternative repository of meaning. As a result, religion and science were no longer working in concert, but rather stood opposed to each other, and humanity was increasingly forced to choose between them.[47]

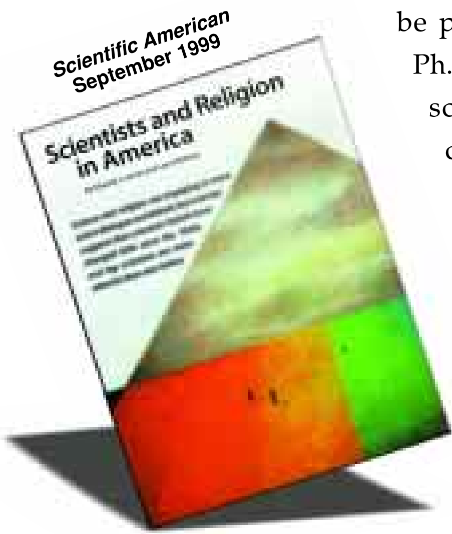
Today, however, this contrived conflict between religion and science is found to be contrary to the very findings of science. Religion declares that the universe was created from nothingness, and science has found proofs of that fact. Religion teaches us that living things are created by God, and science has provided us with evidence of this in the design discovered in living things. In his book, *Nature's Destiny*, Michael Denton wrote: "Science, which has been for centuries the great ally of atheism and skepticism, has become at last, in these final days of the second millennium, what Newton and many of its early advocates had so fervently wished – the 'defender of the anthropocentric faith.'"[48]



Michael Denton

This conclusion attained by science has helped a growing number of scientists to come to a strong belief in God. Noted biochemist Michael Behe refers to this fact when he says, "Incidentally, scientists who believe in God or a reality beyond nature are much more common than popular media stories lead one to believe. There is no reason to think that the figure of 90 percent of the general population that believes in God is much different for scientists."[49]

Confronted by the conclusion established by science, all that the materialists can do is set certain pressure tactics into action, and seek to intimidate the rest of the scientific community. In the West, a scientist has



to conform to certain expectations in order to be promoted, to receive his/her MD or Ph.D., or to have his articles published in scientific journals. The number one condition required is to accept the theory of evolution unconditionally. For this reason, some scientists are forced to uphold Darwinist myths which they may actually reject, disregarding the signs of creation. In an article published in the *Scientific American* magazine, in the September 1999 issue, titled "Scientists and Religion in America", University of Washington sociologist Rodney Stark points out the pressures imposed on scientists:

> There's been 200 years of marketing that if you want to be a scientific person you've got to keep your mind free of the fetters of religion. …In research universities, the religious people keep their mouths shut. And the irreligious people discriminate. There's a reward system to being irreligious in the upper echelons.[50]

Another facet of the systematic struggle waged by materialists against science is the propaganda methods we mentioned earlier. Central to this propaganda are mottoes such as "religion conflicts with science", or "science has got to be materialist". Now let us see why these claims are illogical and unsustainable.

The Medieval Church's Reaction Against Scientists

Anti-religionist circles commonly use the errant practices and reactions of the Medieval Church as a weapon against religion. It is said that the Church retarded Europe and caused it severe misery. Implicit in these efforts is the attempt to associate the Medieval Church with religion, and to deliver the message that "if religion prevails, we will be buried in the

darkness of the Middle Ages". **True religion**, however, is not reflected in the practices and reactions of the Catholic Church.

The Catholic Church, abandoning the true revelation brought by the Prophet Jesus, adopted certain irreligious practices. Science indubitably suffered great harm at the hands of the Church, which was ruled by a clergy serving the special interests of certain few, thus completely divorcing itself from its divine source. This historical development, however, cannot be attributed to the religion of Islam. Islam is based, not on the superstitions of its clergy, but on the Qur'an only, which is the word of God.

A significant example, showing that the bigotry of the Catholic Church had nothing to do with faith, is that scientists like Galileo, who were persecuted by the Church, were actually devout people. (The beliefs of these scientists will be examined in more detail in the second part of the book). This example shows once more that the pressures the religious establishment brought upon science is not a consequence of faith, but the distortion of religion.



The Catholic Church, abandoning the revelation brought by the Prophet Jesus, adopted certain irreligious practices. Even scientists like Galileo faced a stern reaction from the Church. This picture depicts the trial of Galileo during the Inquisition.

Criticism Based on the Bible and the Torah

A number of materialists, who want to portray religion and science as inimical, not only cite examples from the practices of the Catholic Church, but also quote specific passages from the Torah, or the Bible, to demonstrate how they contradict scientific discoveries. Yet, there is one truth they either disregard or pretend ignorance of: The Bible and the Torah are altered texts. Both include many superstitions produced by man. Therefore, it would be very wrong to regard these books as basic reference sources of religion.

The Qur'an, on the other hand, **is the revelation of God. It has not been altered in the least; not even a single letter of it has been changed.** For this reason, there is no contradiction or error in the Qur'an. All the facts proclaimed by the Qur'an parallel scientific findings. Moreover, numerous scientific facts that could only be discovered in our day were announced in the Qur'an to people 1400 years ago. This is an important miracle of the Qur'an, and is one of the definitive proofs that it is the word of God. (Some of the scientific facts pointed out in the Qur'an will be covered in the chapters ahead).

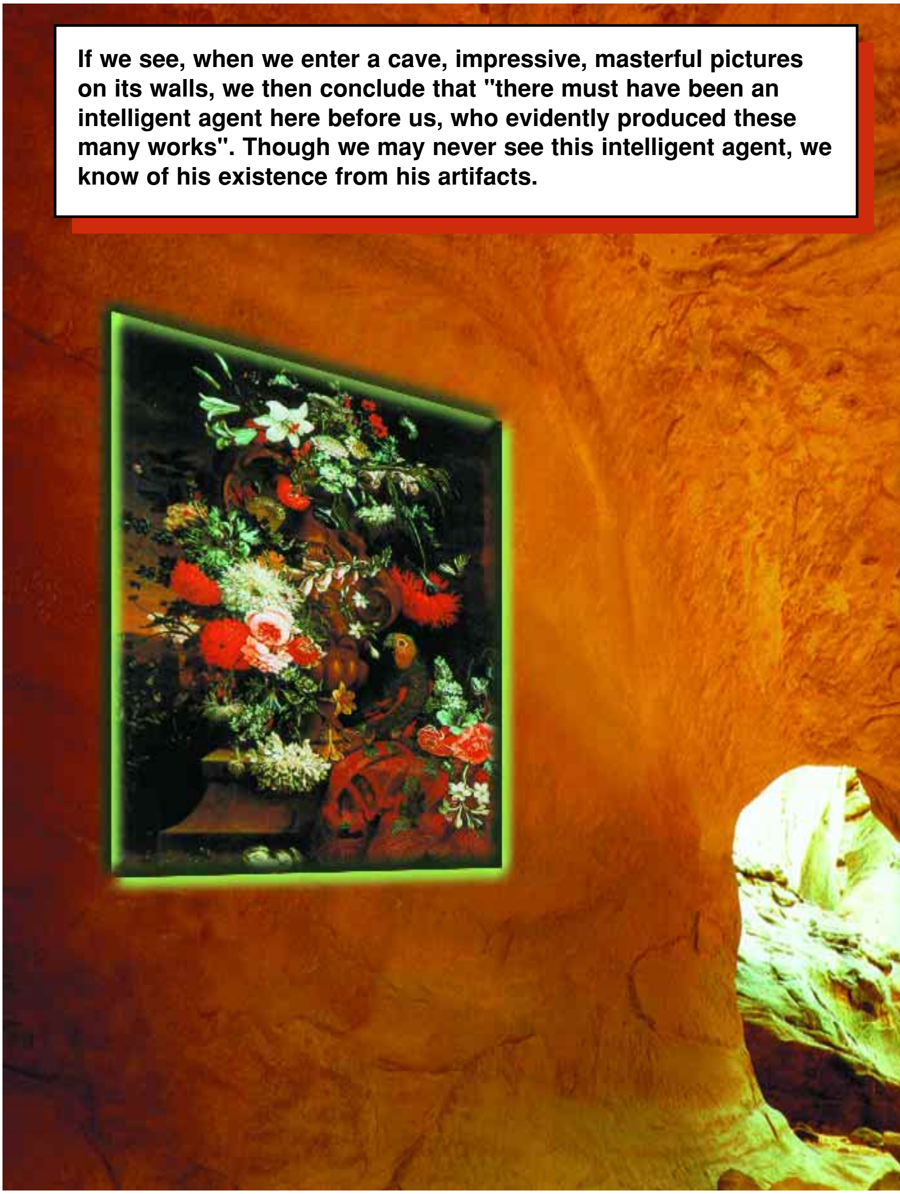
Aware of this, materialists, unable to quote any verses from the Qur'an for their purposes, cite only the Bible or the Torah to express their anti-religionist views.

The Claim that "Science Ought to be Materialist"

Another propaganda tool used by scientists is the cliché that "Scientific studies matter alone, therefore it ought to be materialist".

Actually, this is nothing but a play on words, as anyone who gives it a little thought will recognize. It is true that science studies matter, but this does not imply that it needs to be materialistic; for "studying matter" and "being materialist" are very different things.

When we study matter, we conclude that this matter contains a knowledge and design too great to come about of its own. We can appreciate that this knowledge and design was consciously created by an intelligent agent, though we cannot see him. Let us consider, for instance, a cave, which we do not know whether anyone has visited it before us or



not. If we see, when we enter it, impressive, masterful pictures on the walls of the cave, we then conclude "there must have been an intelligent agent here before us, who obviously produced these many works". We may never see this intelligent agent, but we know of his existence from his artifacts.

It is in this manner that science studies nature, and discovers that there is an order in nature which can by no means be explained by material

factors, and that this design could only have been brought into being through supra-material Wisdom. In other words, the material world teems with evident signs of God's creative power and authority.

Materialists' Bigoted and Dogmatic Approach

One who subscribes to a certain view is free to test whether that view can be verified by scientific facts, and to perform scientific research for that purpose. A person, for instance, can proclaim that the world is flat, and conduct research to support his assertion. The important matter is how this person assesses the scientific data he accumulates. A scientist evaluating scientific results objectively will be unable to find any evidence proving that the earth is flat, on the contrary, he will encounter much evidence that the earth is elliptical. In this case, what this person must do is to admit the truth without prejudice, and give up his earlier beliefs.

The same holds true for materialism. Science has proven that matter is not an absolute being, but that it had a beginning. Moreover, it has shown that there is a mind-boggling design in nature. Therefore, materialist scientists studying matter have seen that their theory is inapplicable, and that the truth is actually the very opposite of their claim.

Interestingly, however, such persons entertain a blind devotion to materialism, exhibiting an astonishing tenacity in holding on to their "belief". A Harvard geneticist, Richard Lewontin, a well known materialist and evolutionist, excuses his dogmatic materialism in these words:

> It is not that the methods and institutions of science somehow compel us to accept a material explanation of the phenomenal world, but, on the contrary, that we are forced by our a priori adherence to material causes to create an apparatus of investigation and a set of concepts that produce material explanations, no matter how counter-intuitive, no matter how mystifying to the uninitiated. Moreover, that materialism is absolute, so we cannot allow a Divine Foot in the door.[51]

Here Lewontin actually depicts the mindset of all materialists. As he acknowledges, materialists first subscribe to the materialist ideology

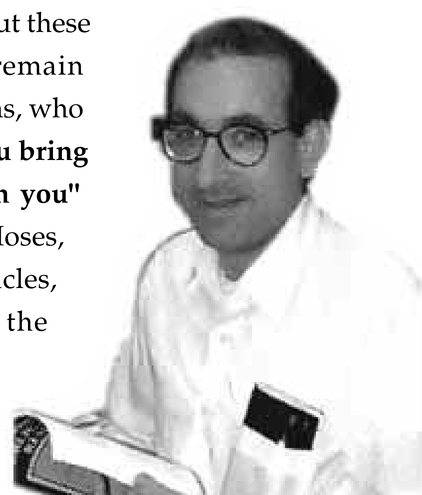
above all else, and then look for evidence to support their ideology. That is to say, materialism is not a conclusion materialists have arrived at through scientific research, but a prejudice they impose upon science.

The same idea is embodied in the words of another evolutionist as well. In his book, titled *Origins: A Skeptic's Guide to Creation of Life on Earth*, the renowned evolutionist Robert Shapiro states his commitment to the theory of evolution as such:

> Some future day may yet arrive when all reasonable chemical experiments run to discover a probable origin for life have failed unequivocally. Further, new geological evidence may indicate a sudden appearance of life on the earth. Finally, we may have explored the universe and found no trace of life, or process leading to life, elsewhere. In such a case, some scientists might choose to turn to religion for an answer. Others, however, myself included, would attempt to sort out the surviving less probable scientific explanations in the hope of selecting one that was still more likely than the remainder.[52]

Here, what Shapiro means when he says "scientific explanations" is actually "materialist explanations". This blind devotion to materialism has led Shapiro, and thousands of others like him, to subscribe to a fanatical disbelief. What they are actually saying is, "no matter what evidence is presented, we will not believe in God".

Most interestingly, this obsession is not peculiar to the current materialists alone. In the Qur'an, God reveals important knowledge about these people who have resolved to remain disbelievers. For instance, the Egyptians, who said, **"no matter what kind of Sign you bring to bewitch us, we will not believe in you"** (Surat al-A'raf: 132) to the Prophet Moses, who showed them a number of miracles, had the same predisposition as the materialists of today. God refers to these people in this way:


Robert Shapiro

> **Some of them listen to you but We have placed covers on their hearts, preventing them from**

understanding it, and heaviness in their ears. Though they see every Sign, they still would not believe, so that when they come to you, disputing with you, the unbelievers say, 'This is nothing but the myths of previous peoples!' (Surat al-An'am: 25)

They have sworn by God with their most earnest oaths that if a Sign comes to them they would believe. Say: 'The Signs are in God's control alone.' What will make you realize that even if a Sign did come, they would still not believe? (Surat al-An'am: 109)





Each creature was created by God with great harmony and perfect design. In examining the design of the feathers of an owl, or observing its masterful flight during the night, a person who uses his reason and follows his conscience will come to see and honor the eternal power and knowledge of God.



THE SCIENTIFIC MIRACLES OF THE QUR'AN

Fourteen centuries ago, God sent down the Qur'an to mankind as a book of guidance. He called upon people to be guided to the truth by adhering to this book. From the day of its revelation to the day of judgment, this last Divine Book and the Sunnah of our Prophet, peace be upon him, will remain the guide for humanity.

The matchless style of the Qur'an and the superior wisdom in it are definite evidence that it is the word of God. In addition, the Qur'an has many miraculous attributes proving that it is a revelation from God. One of these attributes is the fact that a number of scientific truths that we have only been able to uncover by the technology of the 20th century were stated in the Qur'an 1,400 years ago.

Of course the Qur'an is not a book of science. However, many scientific facts that are expressed in an extremely concise and profound manner in its verses have only been discovered with the technology of the 20th century. These facts could not have been known at the time of the Qur'an's revelation, and this is still more proof that the Qur'an is the word of God.

In order to understand the scientific miracle of the Qur'an, we must first take a look at the level of science at the time when this Holy Book was revealed.

In the 7th century, when the Qur'an was revealed, Arab society had many superstitious and groundless beliefs where scientific issues were concerned. Lacking the technology to examine the universe and nature, these early Arabs believed in legends inherited from past generations. They supposed, for example, that mountains supported the sky above. They believed that the earth was flat and that there were high mountains at its both ends. It was thought that these mountains were pillars that kept

the vault of heaven high above.

However all these superstitious beliefs of Arab society were eliminated with the Qur'an. In the 2nd verse of Surat ar-Rad, it was said: **"God is He Who raised up the heavens without any support... "**(Surat ar-Rad: 2). This verse revealed that the belief that the sky remains above because of the mountains was incorrect. In many other subjects, important facts were revealed at a time when no one could have known them. The Qur'an, which was revealed at a time when people knew very little about astronomy, physics, or biology, contains key facts on a variety of subjects such as the creation of the universe, the creation of the human being, the structure of the atmosphere, and the delicate balances that make life on earth possible.

Now, let us look at some of these scientific miracles revealed in the Qur'an together.



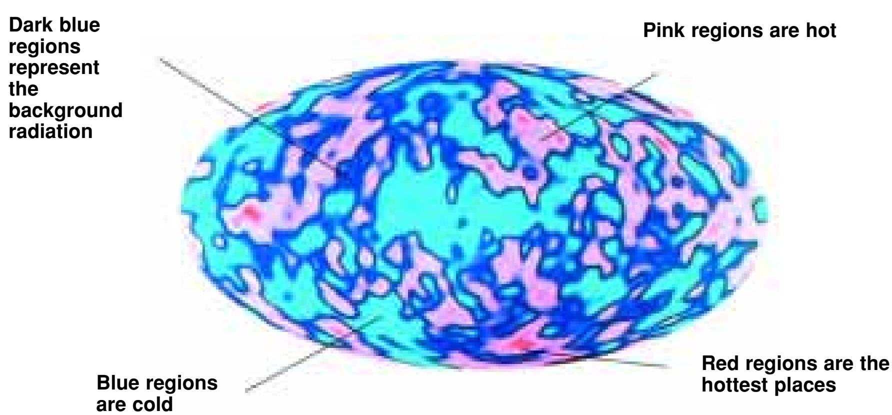
The Coming of the Universe Into Existence

The origin of the universe is described in the Qur'an in the following verse:

He created the heavens and the earth from nothing. (Surat al-An'am: 101)

This information given in the Qur'an is in full agreement with the findings of contemporary science. The conclusion that astrophysics has reached today is that the entire universe, together with the dimensions of matter and time, came into existence as a result of a great explosion that occurred in no time. This event, known as "The Big Bang" proved that the universe was created from nothingness as the result of the explosion of a single point. Modern scientific circles are in agreement that the Big Bang is a rational and provable explanation of the beginning of the universe and of how the universe came into being.

Before the Big Bang, there was no such thing as matter. From a condition of non-existence in which neither matter, nor energy, nor even time existed, and which can only be described metaphysically, matter,



The sensitive sensors on board the COBE space satellite which was launched by NASA in 1992, captured evidentiary remnants of the Big Bang. This discovery served as evidence for the Big Bang, which is the scientific explanation of the fact that the universe was created from nothing.

energy, and time were all created. This fact, only recently discovered by modern physics, was announced to us in the Qur'an 1,400 years ago.

The Expansion of the Universe

In the Qur'an, which was revealed 14 centuries ago at a time when the science of astronomy was still primitive, the expansion of the universe was described like this:

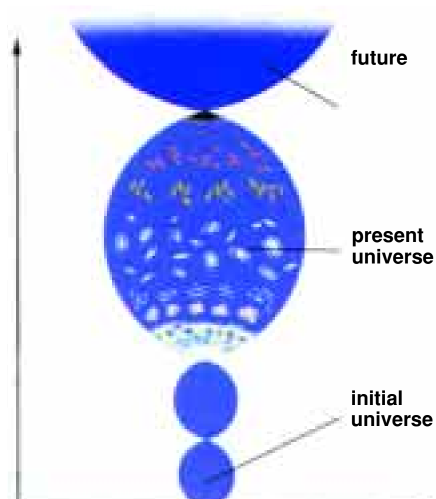
And it is We Who have constructed the heaven with might, and verily, it is We Who are steadily expanding it. (Surat adh-Dhariyat: 47)

The word "heaven", as stated in this verse, is used in various places in the Qur'an with the meaning of space and universe. Here again, the word is used with this meaning. In other words, in the Qur'an it is revealed that the universe "expands". And this is the very conclusion that science has reached today.

Until the dawn of the 20th century, the only view prevailing in the world of science was that "the universe has a constant nature and it has existed since infinite time". The research, observations, and calculations carried out by means of modern technology, however, have revealed that the universe in fact had a beginning, and that it constantly expands.

At the beginning of the 20th century, the Russian physicist Alexander Friedmann and the Belgian cosmologist Georges Lemaître theoretically calculated that the universe is in constant motion and that it is expanding.

This fact was proved also by observational data in 1929. While observing the sky with a telescope, Edwin Hubble, the American astronomer, discovered that the stars and



galaxies were constantly moving away from each other. A universe where everything constantly moves away from everything else implied a constantly expanding universe. The observations carried out in the following years verified that the universe is constantly expanding. This fact was explained in the Qur'an when that was still unknown to anyone. This is because the Qur'an is the word of God, the Creator, and the Ruler of the entire universe.

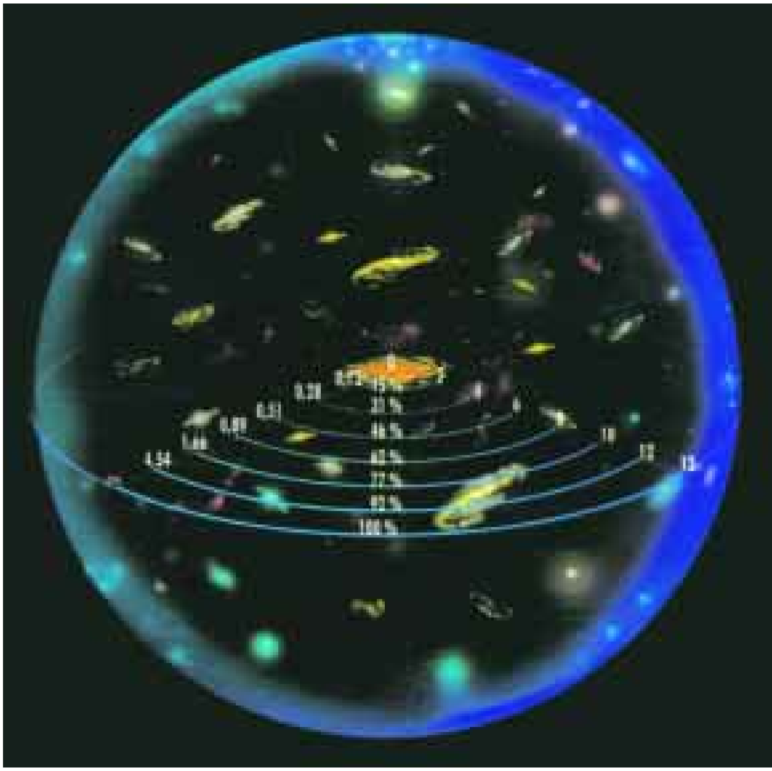
Orbits

One of the most important reasons for the great equilibrium in the universe is the fact that celestial bodies follow specific paths. Stars, planets and satellites all rotate around their own axes and also rotate together with the system of which they are a part, and the universe functions within a finely-tuned order, just like the wheels in a factory.

There are about 200 billion galaxies in the universe, consisting of nearly 200 billion stars in each. Most of these stars have planets, and most of those planets have satellites. All of these heavenly bodies move in very precisely computed orbits. For millions of years, each has been "swimming" along in its own orbit in perfect harmony and order with all the others. Moreover, many comets also move along in the orbits determined for them.

The orbits in the universe do not only belong to some celestial bodies. The Solar System and even other galaxies also exhibit considerable motion around other centers. Every year the Earth, and the Solar System with it, move some 500 million km from where they were the previous year. It has been calculated that even the slightest deviation from celestial bodies' paths could have drastic consequences which might spell the end of the entire system. For example, the consequences of the earth's deviating from its course by a mere 3 mm have been described in one source as follows:

> While rotating around the sun, the earth follows such an orbit that, every 18 miles, it only deviates 2.8 millimeters from a direct course. The orbit followed by the earth never changes, because even a deviation of 3 millimeters would cause catastrophic disasters: if the deviation were 2.5 mm instead of 2.8 mm, then the orbit would be very large, and all of us would freeze. If the deviation were 3.1 mm, we would be scorched to death.[53]



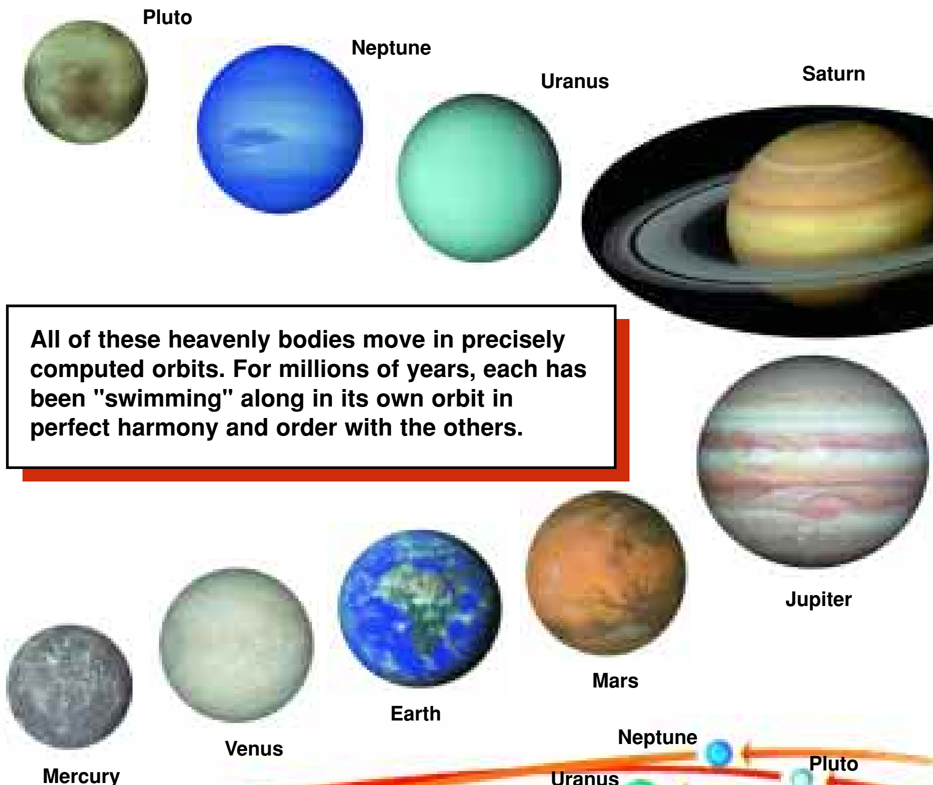
Another characteristic of heavenly bodies is that they also rotate around their own axes. This may be one of the implications of the verse **"[I swear] by Heaven with its cyclical systems." (Surat at-Tariq: 11)**.

Surely at the time the Qur'an was revealed, mankind did not possess today's telescopes or advanced observation technologies to observe millions of kilometers of space, nor the modern knowledge of physics or astronomy. Therefore, at that time, it was not possible to determine scientifically that space is "full of paths and orbits" as stated in the verse. (Surat adh-Dhariyat: 7) However, this was openly declared to us in the Qur'an that was revealed at that time—because the Qur'an is the word of God.

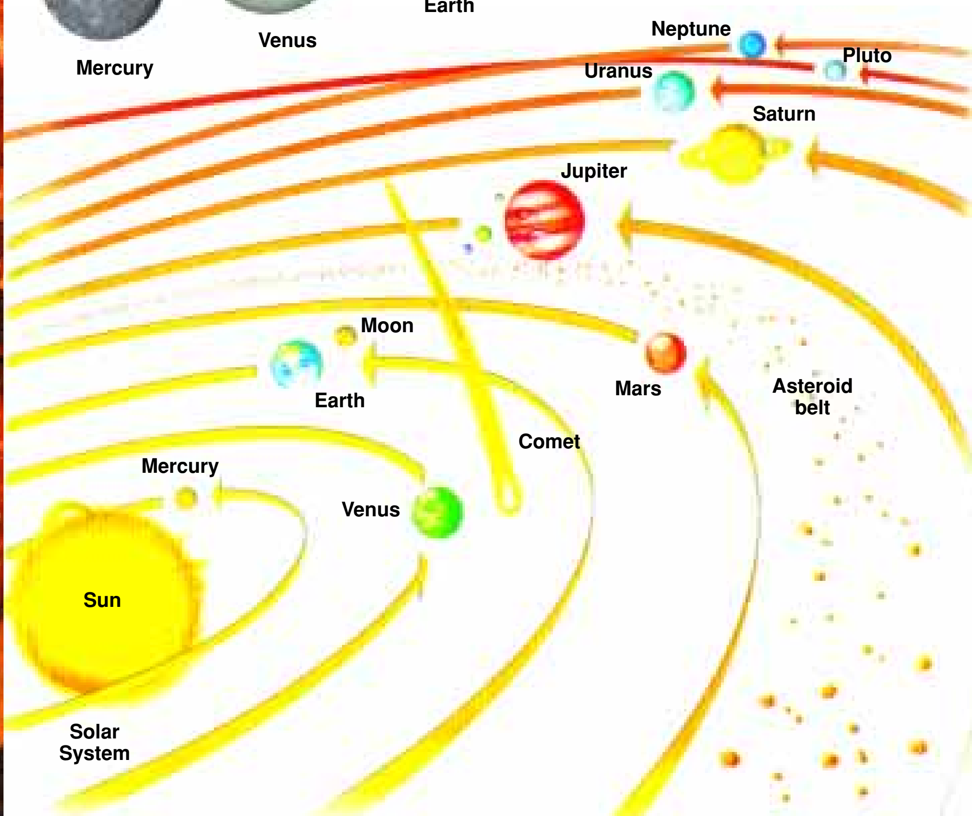
The Sun's Trajectory

It is stressed in the Qur'an that the Sun and Moon follow specific courses:

It is He Who created night and day and the sun and moon, each one swimming in a sphere. (Surat al-Anbiya': 33)



All of these heavenly bodies move in precisely computed orbits. For millions of years, each has been "swimming" along in its own orbit in perfect harmony and order with the others.



The word "swim" in the above verse is expressed in Arabic by the word *sabaha* and is used to describe the movement of the Sun in space. The word means that the Sun does not move randomly through space, but that it rotates around its axis and follows a course as it does so. The fact that the Sun is not fixed in position but rather follows a specific trajectory is also stated in another verse:

And the sun runs to its resting place. That is the decree of the Almighty, the All-Knowing. (Surah Ya Sin: 38)

These facts set out in the Qur'an were only discovered by means of astronomical advances in our own time. According to astronomers' calculations, the Sun moves in the general direction of the star Vega, which lies somewhat close to the "Solar Apex," —the unique direction in our galaxy that our sun moves—at an incredible speed of 720,000 km/hour. In rough terms, this shows that the Sun traverses some 17.28 million kilometers a day. As well as the Sun itself, all the planets and satellites within its gravitational field also travel the same distance.

The Protected Roof

In the Qur'an, God calls our attention to a very important attribute of the sky:

We made the sky a preserved and protected roof yet still they turn away from Our Signs. (Surat al-Anbiya: 32)

This attribute of the sky has been proved by scientific research carried out in the 20th century.

The atmosphere surrounding the earth serves crucial functions for the continuity of life. While destroying many meteors big and small as they approach the earth, it prevents them from falling to earth and harming living things.

In addition, the atmosphere filters the light rays coming from space that are harmful to living things. Strikingly, the atmosphere lets only harmless

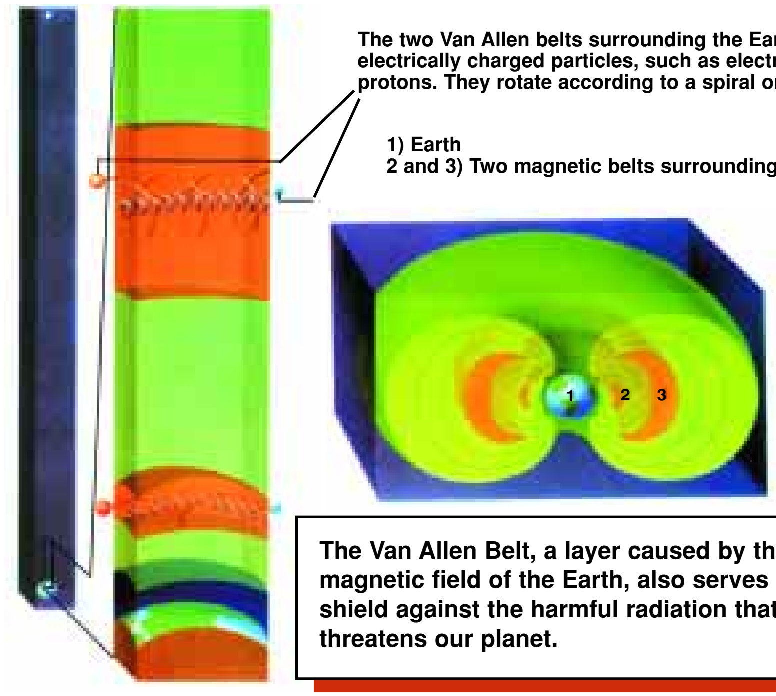


As illustrated here, the celestial bodies wandering in space could pose a serious threat to the Earth. Yet, God, He Who creates most perfectly, has made the atmosphere a protective roof.

and useful rays– visible light, near ultraviolet light, and radio waves pass through. All of this radiation is vital for life. Near ultraviolet rays, which are only partially let in by the atmosphere, are very important for the photosynthesis of plants and for the survival of all living beings. The majority of the intense ultraviolet rays emitted from the sun are filtered out by the ozone layer of the atmosphere and only a limited–and essential–part of the ultraviolet spectrum reaches the Earth.

The protective function of the atmosphere does not end here. The atmosphere also protects the earth from the freezing cold of the space, which is about minus 270 degrees Centigrade.

It is not only the atmosphere that protects the Earth from harmful effects. In addition to the atmosphere, the **Van Allen Belt**, a layer caused by the magnetic field of the Earth, also serves as a shield against the harmful radiation that threatens our planet. This radiation, which is constantly emitted by the Sun and other stars, is deadly to living things. If the Van Allen belt did not exist, the massive outbursts of energy called



The Van Allen Belt, a layer caused by the magnetic field of the Earth, also serves as a shield against the harmful radiation that threatens our planet.

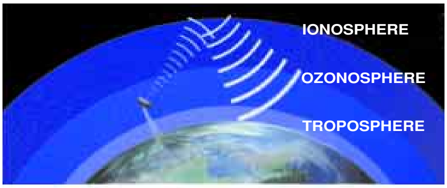
solar flares that frequently occur in the Sun would destroy all life on Earth.

Dr. Hugh Ross has this to say on the importance of Van Allen Belts to our lives:

> In fact, the Earth has the highest density of any of the planets in our Solar System. This large nickel-iron core is responsible for our large magnetic field. This magnetic field produces the Van-Allen radiation shield, which protects the Earth from radiation bombardment. If this shield were not present, life would not be possible on the Earth. The only other rocky planet to have any magnetic field is Mercury—but its field strength is 100 times less than the Earth's. Even Venus, our sister planet, has no magnetic field. The Van-Allen radiation shield is a design unique to the Earth.[54]

The energy transmitted in just one of these bursts detected in recent years was calculated to be equivalent to 100 billion atomic bombs similar to the one dropped on Hiroshima. Fifty-eight hours after the burst, it was observed that the magnetic needles of compasses displayed unusual movement and 250 kilometers above the earth's atmosphere, the temperature suddenly increased to 2,500 degrees Celsius.

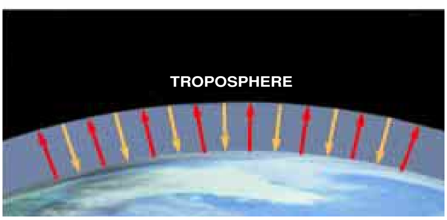
In short, a perfect system is at work high above the Earth. It surrounds



The Ionosphere layer reflects radio waves broadcast from a certain centre back down to the Earth, thus enabling broadcasts to be received from long distances.



The Ozonosphere turns harmful cosmic rays like ultraviolet back to space, hence preventing them from reaching the Earth and harming life.



The troposphere layer enables water vapor rising from the surface of the Earth to be condensed and turn back down to the Earth as rain.

our world and protects it against external threats. Scientists only learned about it recently, yet centuries ago, God informed us in the Qur'an of the world's atmosphere functioning as a protective shield.

The Returning Sky

The 11th verse of Surat at-Tariq in the Qur'an, refers to the "returning" function of the sky:

By Heaven with its cyclical systems. (Surat at-Tariq: 11)

The word *rajaai* interpreted as **"cyclical"** in Qur'an translations also has meanings of **"sending back"** or **"returning**".

As known, the atmosphere surrounding the Earth consists of many layers. Each layer serves an important purpose for the benefit of life. Research has revealed that these layers have the function of turning the materials or rays they are exposed to back into space or back down to the Earth. Now let us examine with a few examples of this "recycling" function of the layers encircling the Earth.

The troposphere, 13 to 15 kilometers above the Earth, enables water vapor rising from the surface of the Earth to be condensed and turn back as rain.

The ozone layer, which lies in the Stratosphere at an altitude of 25 kilometers, reflects harmful radiation and ultraviolet light coming from space and turns both back into space.

The ionosphere reflects radio waves broadcast from the Earth back down to different parts of the world, just like a passive communications satellite, and thus makes wireless communication, radio, and television broadcasting possible over long distances.

The magnetosphere layer turns the harmful radioactive particles emitted by the Sun and other stars back into space before they reach the Earth.

The fact that this property of the atmosphere's layers, that was only demonstrated in the recent past was announced centuries ago in the Qur'an, once again demonstrates that the Qur'an is the word of God.

The Layers of the Atmosphere

One fact about the universe revealed in the verses of the Qur'an is that the sky is made up of seven layers:

It is He Who created everything on the earth for you and then directed His attention up to heaven and arranged it into seven regular heavens. He has knowledge of all things.
(Surat al-Baqara: 29)

Then He turned to heaven when it was smoke... In two days He determined them as seven heavens and revealed, in every heaven, its own mandate...
(Surah Fussilat: 11-12)

The word "heavens", which appears in many verses in the Qur'an, is used to refer to the sky above the Earth, as well as the entire universe. Given this meaning of the word, it is seen that the Earth's sky, or the atmosphere, is made up of seven layers.

Indeed, today it is known that the world's atmosphere consists of different layers that lie on top of each other.[55] The definitions made based on the criteria of chemical contents or air temperature have determined the

atmosphere of the earth as seven layers.[56] According to the "Limited Fine Mesh Model (LFMII)", a model of atmosphere used to estimate weather conditions for 48 hours, the atmosphere again consists of 7 layers. According to the modern geological definitions the seven layers of the atmosphere are as follows:

1. Troposphere
2. Stratosphere
3. Mesosphere
4. Thermosphere
5. Exosphere
6. Ionosphere
7. Magnetosphere

Another important miracle on this subject is mentioned in the statement **"(He) revealed, in every heaven, its own mandate"** in the 12th verse of Surah Fussilat. In other words, in the verse, God states that He assigned each heaven its own duty. Truly, as seen in the previous section, each one of these layers has vital duties for the benefit of human kind and all other living things on the Earth. Each layer has a particular function, ranging from forming rain to preventing harmful rays, from reflecting radio waves, to averting the harmful effects of meteors.

The verses below inform us about the appearance of the seven layers of the atmosphere.

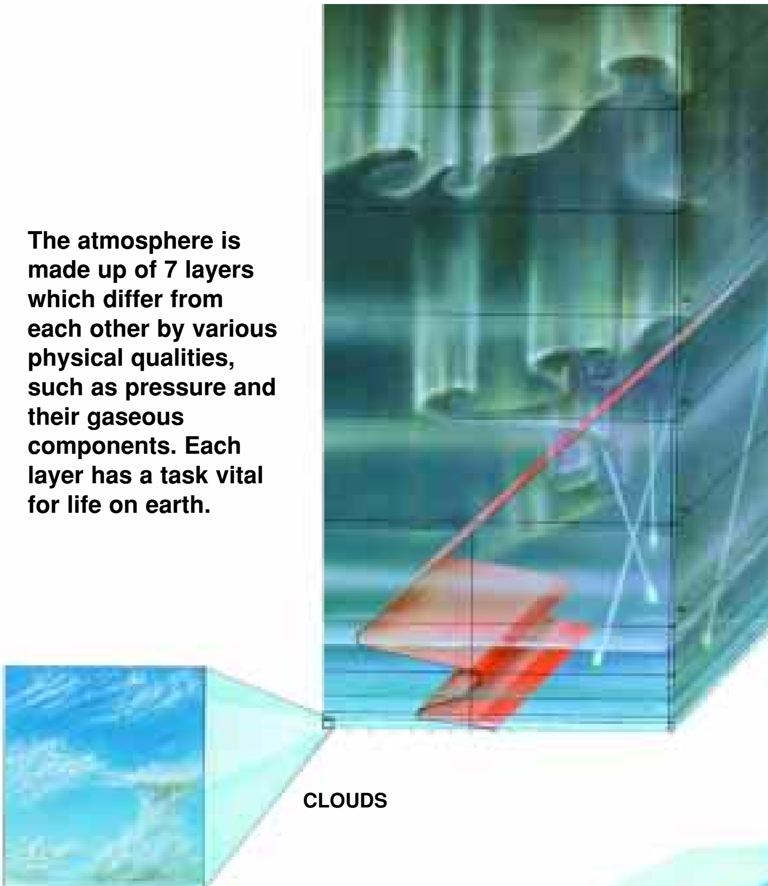
Do you not see how He created seven heavens in layers?
(Surah Nuh: 15)

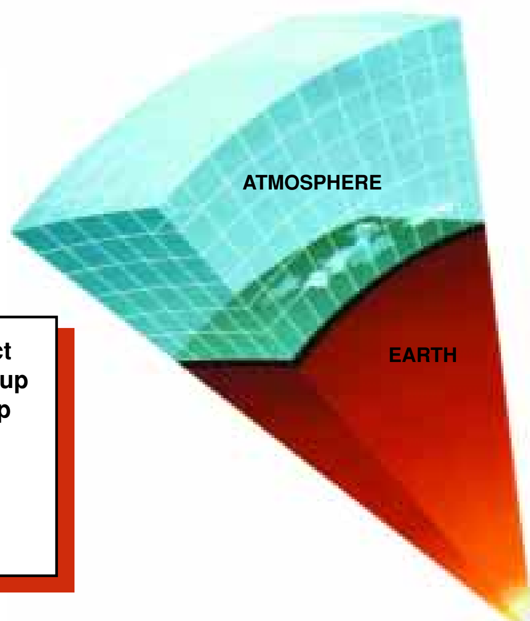
He Who created the seven heavens in layers...
(Surat al-Mulk: 3)

The Arabic word *tibaqan* in these verses, translated into English as "layer" means "layer, the appropriate cover or covering for something," and thus stresses how the top layer is well suited to the lower. The word is also used in the plural here, giving the meaning of "layers." The sky, described in the verse as being in layers, is without doubt the most perfect expression of the atmosphere.

It is a great miracle that these facts, which could not possibly be discovered without the technology of the 20th century, were explicitly stated by the Qur'an 1,400 years ago.

The atmosphere is made up of 7 layers which differ from each other by various physical qualities, such as pressure and their gaseous components. Each layer has a task vital for life on earth.





Today, it is an established fact that the atmosphere is made up of different layers lying on top of one another. Just as it is described in the Qur'an, the atmosphere is made up of exactly seven layers.

The Function of Mountains

The Qur'an draws attention to a very important geological function of mountains.

We placed firmly embedded mountains on the earth, so it would not move under them... (Surat al-Anbiya: 31)

As we have noticed, it is stated in the verse that mountains have the function of preventing shocks in the Earth.

This fact was not known by anyone at the time the Qur'an was revealed. It was in fact brought to light only recently as a result of the findings of modern geology.

It used to be thought that mountains were merely protrusions on the face of the earth.

Scientists have now come to realize that mountains are not just surface elevations or protrusions, however, but that they extend 10-15 times their height into the ground, and these extensions are called mountain roots. With these properties, mountains play a similar role to a nail or a stake hammered into the ground. For instance, a peak such as Mount Everest, which rises almost 9 km above the Earth's surface, has a root that extends downward for more than 125 km.[57]

Besides, mountains emerge as a result of the movements and collisions of massive plates forming the Earth's crust. When two plates collide, the stronger one slides under the other, the one on the top bends and forms heights and mountains. The layer beneath proceeds under the ground and makes a deep extension downward. That means, as pointed out earlier, that mountains have a portion stretching downwards, as large as their visible parts on the Earth.

In a scientific text, the structure of mountains is described as follows:

Where continents are thicker, as in mountain ranges, the crust sinks deeper into the mantle.[58]

Professor Siaveda, a world famous marine geologist, made the following comment in referring to the way mountains are imbedded into the Earth like roots:

The fundamental difference between continental mountains and the oceanic mountains lies in its material... But the common denominator on both

mountains are that they have roots to support the mountains. In the case of continental mountains, light-low density material from the mountain is extended down into the earth as a root. In the case of oceanic mountains, there is also light material supporting the mountain as a root... [T]he function of the roots are to support the mountains according to the law of Archimedes.[59]

Moreover, Frank Press, the former President of the U.S. National Academy of Sciences, says in his book *Earth*, still used as a university textbook all over the world, that mountains resemble stakes and are buried into the depths of the earth.[60]

In a verse, this role of the mountains is pointed out by a comparison with **"pegs"**:

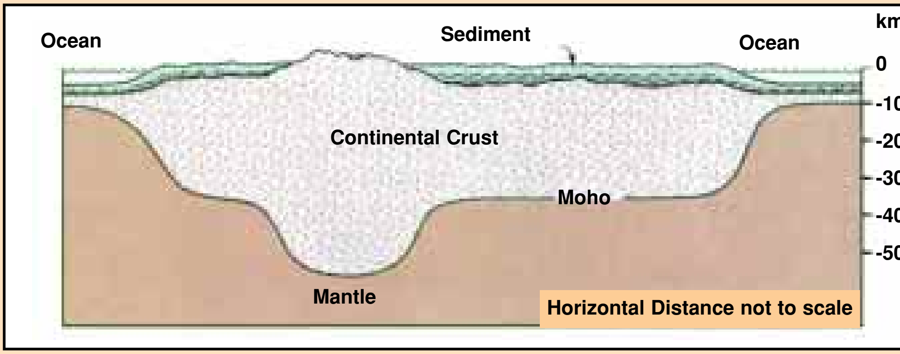
Have We not made the earth as a bed and the mountains its pegs? (Surat an-Naba': 6-7)

In another verse God has revealed that He has **"made the mountains firm."** (Surat an-Nazi'at: 32) The Arabic word *arsaha* in this verse means "has made rooted, made fixed, hammered into the ground." Thanks to these features, mountains extend over and under the ground at the points where the layers of the earth meet, and rivet those layers together. In this way, they stabilize the earth's crust and thus prevent it from sliding over the magma stratum or among its own strata. In short, we can compare mountains to nails holding pieces of wood together.

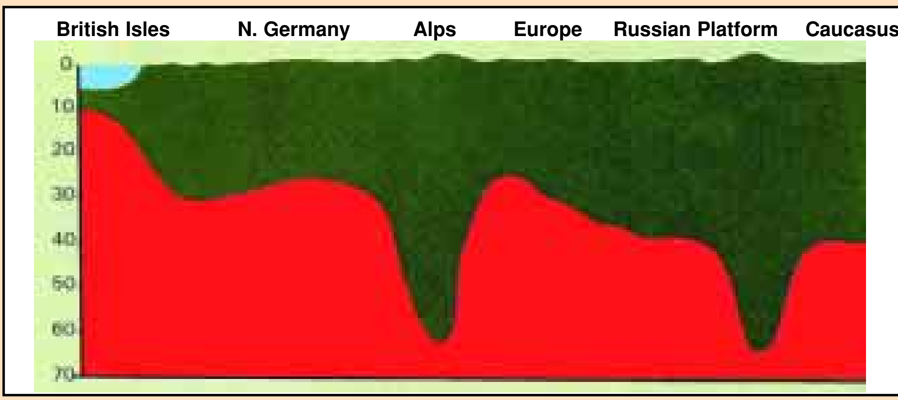
Today we know that the rocky outer stratum of the earth is riven by deep faults and split up into plates floating on magma. Given the high speed at which the earth rotates around its own axis, these floating plates would move around were it not for the fixative effect of the mountains. In that event, no soil could form on the face of the Earth, no water could be collected in the soil, no plants could grow, and no roads or buildings could be constructed; in short, life on Earth would be impossible. By the mercy of God, however, mountains to a large extent prevent movement on the surface of the Earth by functioning just like nails.

This vital role of mountains, that was discovered by modern geology and seismic research, was revealed in the Qur'an centuries ago as an example of the supreme wisdom in God's creation. In another verse, it is again said:

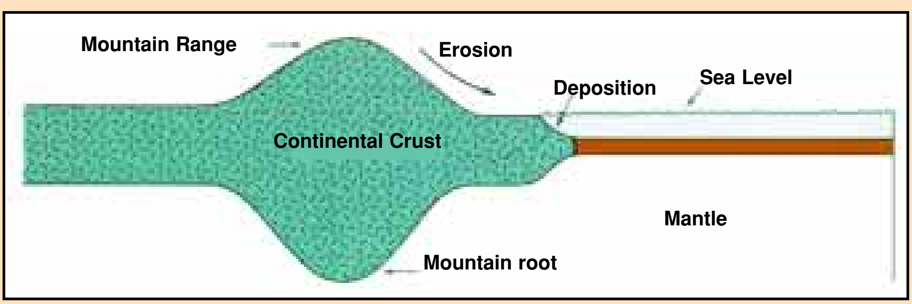
It is God Who cast firmly embedded mountains on the earth so that it would not move under you... (Surah Luqman: 10)



Mountains have roots deep under the surface of the ground. (*Earth*, Press and Siever, p. 413)



Schematic section. Mountains, like pegs, have deep roots embedded in the ground. (*Anatomy of the Earth*, Cailleux, p.220)



Another illustration shows how mountains are peg-like in shape, due to their deep roots. (*Earth Science*, Tarbuck and Lutgens, p.158)

The Identity in the Fingerprint

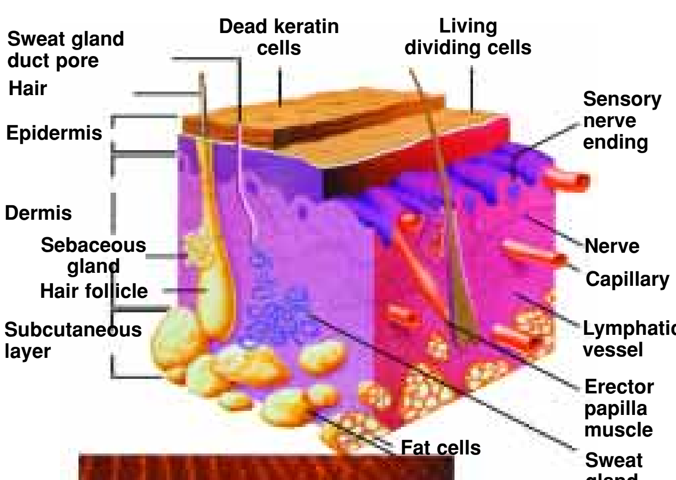
While it is stated in the Qur'an that it is easy for God to bring man back to life after death, peoples' fingerprints are particularly emphasized:

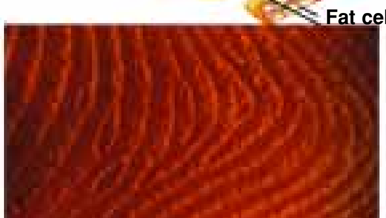
Yes, We are able to put together in perfect order the very tips of his fingers. (Surat al-Qiyama: 3-4)

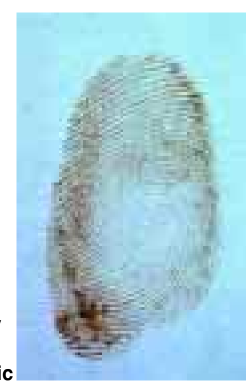
The emphasis on fingerprints has a very special meaning. This is because everyone's fingerprint is unique to himself. Every person who is alive or who has ever lived in this world has a set of unique fingerprints.

That is why fingerprints are accepted as a very important proof of identity, exclusive to their owner, and are used for this purpose around the world.

But what is important is that this feature of fingerprints was only discovered in the late 19th century. Before then, people regarded fingerprints as ordinary curves without any specific importance or meaning. However in the Qur'an, God points to the fingertips, which did not attract anyone's attention at that time, and calls our attention to their importance–an importance that was only finally understood in our day.







As illustrated here, the fingerprint which is unique to each person, derives from the same structure in all people.

The Movement of Mountains

In one verse, we are informed that mountains are not motionless as they seem, but are in constant motion:

You will see the mountains you reckoned to be solid going past like clouds. (Surat an-Naml: 88)

This motion of the mountains is caused by the movement of the Earth's crust that they are located on. The Earth's crust 'floats' over the mantle layer, which is denser. It was at the beginning of the 20th century when, for the first time in history, a German scientist by the name of Alfred Wegener proposed that the continents of the earth had been attached together when it first formed, but then drifted in different directions, and thus separated as they moved away from each other.

Geologists understood that that Wegener was right only in the 1980s, 50 years after his death. As Wegener pointed out in an article published in 1915, the land masses of the earth were joined together about 500 million years ago, and this large mass, called Pangaea, was located in the South Pole.

Approximately 180 million years ago, Pangaea divided into two parts, which drifted in different directions. One of these giant continents was Gondwana, which included Africa, Australia, Antarctica and India. The second one was Laurasia, which included Europe, North America and Asia, except for India. Over the next 150 million years following this separation, Gondwana and Laurasia divided into smaller parts.

These continents that emerged after the split of Pangaea have been constantly moving on the Earth's surface at several centimeters per year, in the meantime changing the sea and land ratios of the Earth.

Discovered as a result of the geological research carried out at the beginning of the 20th century, this movement of the Earth's crust is explained by scientists as follows:

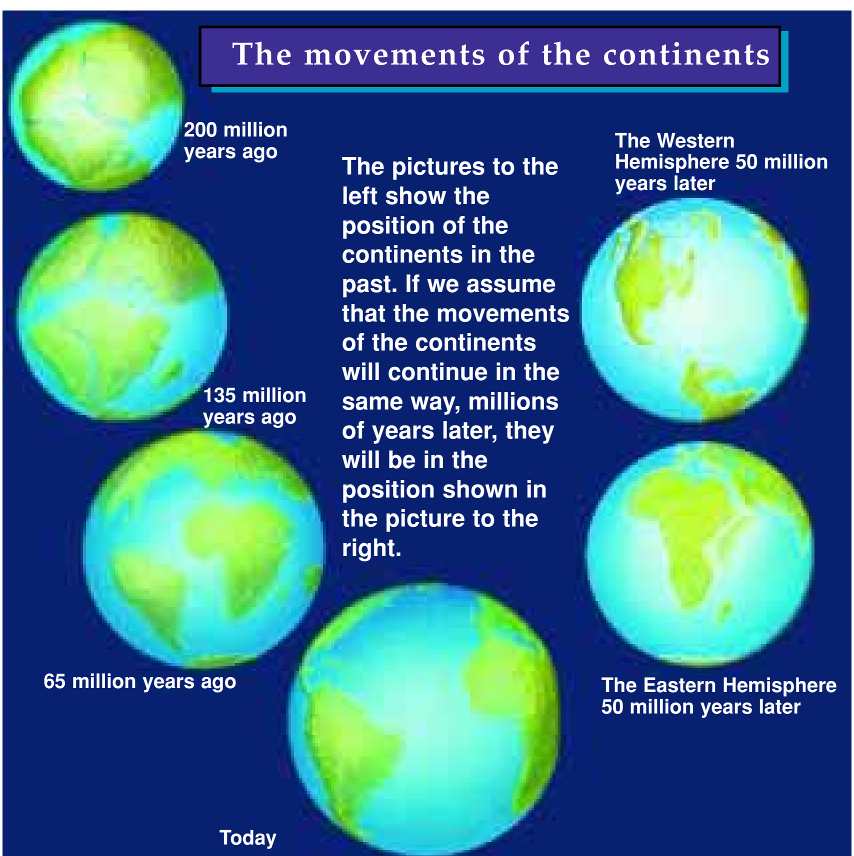
> The crust and the uppermost part of the mantle, with a thickness of about 100 kms., are divided into segments called plates. There are six major plates, and several small ones. According to the theory called plate tectonics, these plates move about on Earth, carrying continents and ocean floor with them... Continental motion has been measured at

from 1-5 cm per year. As the plates continue to move about, this will produce a slow change in Earth's geography. Each year, for instance, the Atlantic Ocean becomes slightly wider.[61]

There is a very important point to be stated here: God has referred to the motion of mountains as a drifting action in the verse. Today, modern scientists also use the term "continental drift" for this motion. [62]

Continental drift is something which could not be observed at the time of the revelation of the Qur'an, and in the words, **"You will see the mountains you reckoned to be solid"** God revealed in advance the way in which people were to approach the subject. He then revealed another truth, saying that the mountains went past like clouds. As we have seen, attention is drawn in the verse to the mobility of the stratum in which mountains stand.

Unquestionably, it is one of the miracles of the Qur'an that this scientific fact, which has recently been discovered by science, was announced in the Qur'an.



The Miracle in the Iron

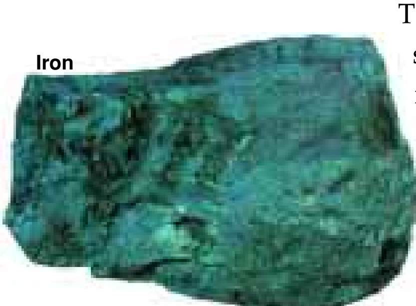
Iron is one of the elements highlighted in the Qur'an. In Surat al-Hadid, meaning Iron, we are informed:

... And We also sent down iron in which there lies great force and which has many uses for mankind... (Surat al-Hadid: 25)

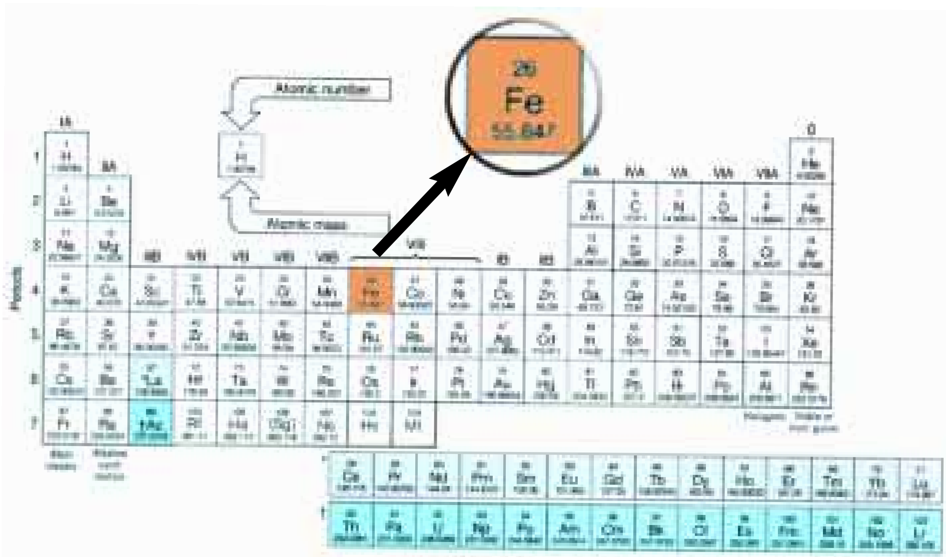
The word *anzalna*, translated as "sent down" and used for iron in the verse, could be thought of having a metaphorical meaning to explain that iron has been given to benefit people. But when we take into consideration the literal meaning of the word, which is, "being physically sent down from the sky", as is in the case of rain and the Sun's rays, we realize that this verse implies a very significant scientific miracle. This is because modern astronomical findings have disclosed that the iron found in our world has come from the giant stars in outer space.[63]

Not only the iron on earth but also the iron in the entire Solar System comes from outer space since the temperature in the sun is inadequate for the formation of the element iron. The Sun has a surface temperature of 6,000 degrees Celsius and a core temperature of approximately 20 million degrees. Iron can only be produced in much larger stars than the Sun, where the temperature reaches a few hundred million degrees. When the amount of iron exceeds a certain level in a star, the star can no longer accommodate it, and eventually it explodes in what is called a "nova" or a "supernova". These explosions make it possible for iron to be given off into space.[64]

One scientific source provides the following information on this subject:



There is also evidence for older supernova events: Enhanced levels of iron-60 in deep-sea sediments have been interpreted as indications that a supernova explosion occurred within 90 light-years of the sun about 5 million years ago. Iron-60 is a radioactive isotope of iron, formed in supernova explosions, which decays with a half life of 1.5 million years. An enhanced presence of this isotope in



Al-Hadid is the 57th surah of the Qur'an. The numerical value of the word "al-hadid" in Arabic is again 57. The numerical value of the word "hadid" alone is 26. As seen also in the above periodic table, 26 is the atomic number of iron.

a geologic layer indicates the recent nucleosynthesis of elements nearby in space and their subsequent transport to the earth (perhaps as part of dust grains).[65]

All this shows that iron did not form on the Earth, but was carried from supernovas, and was "sent down ", in exactly the same way as stated in the verse. It is clear that this fact could not have been scientifically known in the 7th century, when the Qur'an was revealed. However, this fact is related in the Qur'an, the word of God Who encompasses all things in His infinite knowledge.

Astronomy has also revealed that the other elements also formed outside the Earth. In the expression **"We also sent down iron"** in the verse, the word "also" may well be referring to that fact. However, the fact that the verse specifically mentions iron is exceedingly thought-provoking in the light of discoveries made at the end of the 20th century. In his book *Nature's Destiny*, the well-known microbiologist Michael Denton emphasizes the importance of iron:

> **Of all the metals there is none more essential to life than iron. It is the accumulation of iron in the center of a star which triggers a supernova explosion and the subsequent scattering of the vital atoms of life throughout the cosmos.** It was the drawing by gravity of iron atoms to the center of the primeval earth that generated the heat which caused the initial chemical differentiation of the earth, the outgassing of the early atmosphere, and ultimately the formation of the hydrosphere. It is molten iron in the center of the earth which, acting like a gigantic dynamo, generates the earth's magnetic field, which in turn creates the Van Allen radiation belts that shield the earth's surface from destructive high-energy-penetrating cosmic radiation and preserve the crucial ozone layer from cosmic ray destruction…
>
> **Without the iron atom, there would be no carbon-based life in the cosmos**; no supernovae, no heating of the primitive earth, no atmosphere or hydrosphere. There would be no protective magnetic field, no Van Allen radiation belts, no ozone layer, no metal to make hemoglobin [in human blood], no metal to tame the reactivity of oxygen, and no oxidative metabolism.
>
> The intriguing and intimate relationship between life and iron, between the red color of blood and the dying of some distant star, not only indicates the relevance of metals to biology but also the biocentricity of the cosmos…[66]

The importance of the iron atom can clearly be seen from this account. The fact that particular attention is drawn to iron in the Qur'an emphasizes the importance of the element. In addition to all this, there is another secret in the Qur'an which draws attention to the importance of iron: Verse 25 in Surat al-Hadid, which refers to iron, contains two rather interesting mathematical codes.

Al- Hadid is the 57th surah in the Qur'an. The numerical (abjad) value of the word *al-Hadid* in Arabic, when the numerical values of its letters are added up, is also 57.

The numerical value of the word *hadid* alone is 26. And 26 is the atomic number of iron.

The Fecundating Winds

In one verse of the Qur'an, the "fecundating" characteristic of the winds, and the formation of rain as a result are mentioned:

And We send the fecundating winds, then cause water to descend from the sky, therewith providing you with water in abundance. (Surat al-Hijr: 22)

In this verse, it is pointed out that the first stage in the formation of rain is wind. Until the beginning of the 20th century, the only relationship between the wind and the rain that was known, was that the wind drove the clouds. However, modern meteorological findings have demonstrated the "fecundating" role of the wind in the formation of rain.

This fecundating function of the wind works in the following way:

On the surface of oceans and seas, countless air bubbles form because of the water's foaming action. The moment these bubbles burst, thousands of tiny particles, with a diameter of just one hundredth of a millimeter, are thrown up into the air. These particles, known as "aerosols", mix with dust carried from the land by the wind, and are carried to the upper layers of the atmosphere. These particles carried to higher altitudes by winds come into contact with water vapor up there. Water vapor condenses around these particles and turns into water droplets. These water droplets first come together and form clouds, and then fall to the Earth in the form of rain.

As seen, winds "fecundate" the water vapor floating in the air with the particles they carry from the sea, and eventually help the formation of rain clouds.

If winds did not possess this property, water droplets in the upper atmosphere would never form, and there would be no such thing as rain.

The most important point here is that this critical role of the wind in the formation of rain was stated centuries ago in the Qur'an, at a time when people knew very little about natural phenomena…

Another piece of information about the fecundating aspect of wind is the role it plays in the fertilization of plants. Many plants on the Earth ensure their survival by spreading their pollen by means of the wind.

Many open pollinated plants, pine and palm trees and similar, as well as flowering seed plants and all grasses are fertilized by the wind. The wind takes the pollen from the plants and aids fertilization by carrying the pollen to other plants of the same species.

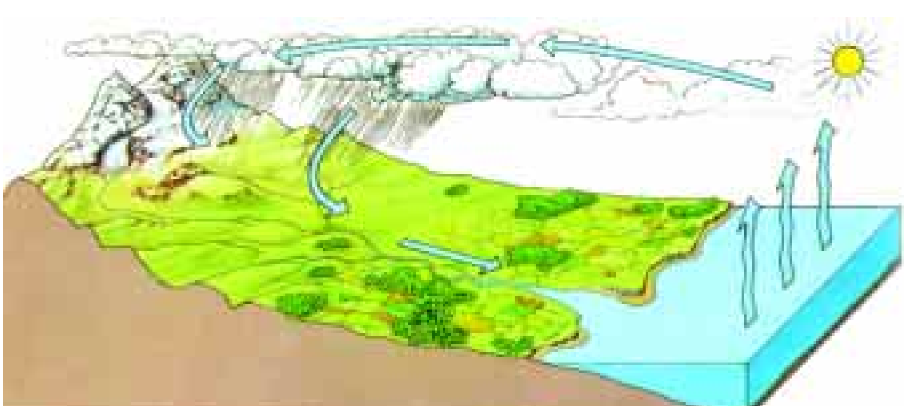
This effect of wind on plants was unknown until very recently. When it was realized, however, that plants are divided into males and females, the fertilizing effect of the wind was also understood. The Qur'an indicates this fact in the verse, **"... We send down rain from the sky, and produce on the earth every kind of noble creature, in pairs."** (Surah Luqman: 10)

The Proportion of Rain

One of the items of information given in the Qur'an about rain is that it is sent down to Earth in due measure. This is mentioned in Surat az-Zukhruf as follows:

It is He who sends down water in measured amounts from the sky by which We bring a dead land back to life. That is how you too will be raised (from the dead).
(Surat az-Zukhruf: 11)

This measured quantity in rain has again been discovered by modern research. It is estimated that in one second, approximately 16 million tons



On the earth, water is recycled according to a certain "measure". Life on earth is dependant on this water cycle.

of water evaporates from the Earth. This figure amounts to 513 trillion tons of water in one year. This number is equal to the amount of rain that falls on the Earth in a year. This means that water continuously circulates in a balanced cycle, in a "measure". Life on Earth depends on this water cycle. Even if people used all the available technology in the world, they would not be able to reproduce this cycle artificially.

Even a minor deviation in this equilibrium would very soon give rise to a major ecological imbalance that would bring about the end of life on Earth. Yet, this never happens, and rain keeps falling every year in exactly the same quantity just as revealed in the Qur'an.

The proportion of rain does not merely apply to its quantity, but also to the speed of the falling rain drops. The speed of rain drops, regardless of their size, does not exceed a certain limit.

Philipp Lenard, a Nobel-prize winning German physicist, determined that the speed at which raindrops fall increases with drop diameter, up to a size of 4.5 mm (0.18 inch). For larger drops, however, the speed of descent does not increase beyond 8 meters per second (26 ft/sec).[67] This is attributed to the shape of the falling drops, which increases their air resistance and prevents them from exceeding a certain speed.

As can be seen, attention is drawn in the Qur'an to a delicate adjustment in rain which could not have been known 1400 years ago.

The Seas' Not Mingling With One Another

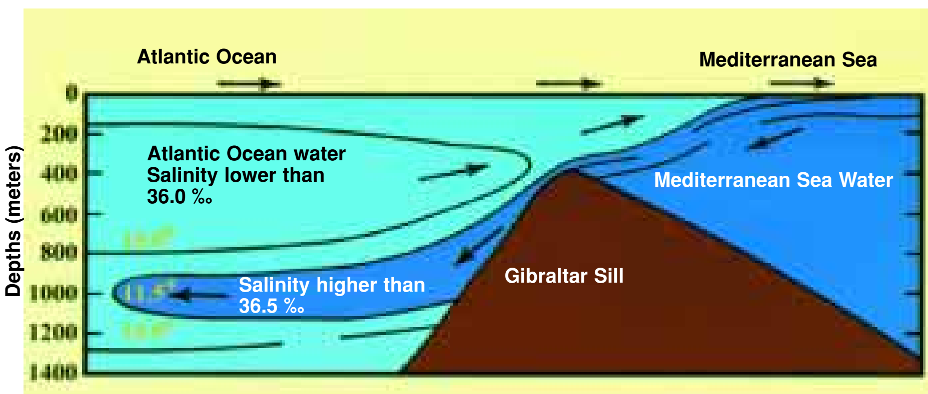
One of the properties of seas that has only recently been discovered is related in a verse of the Qur'an as follows:

He has let loose the two seas, converging together, with a barrier between them they do not break through. (Surat ar-Rahman: 19-20)

This property of the seas, that they come together yet do not mingle with one another at all, has only very recently been discovered by oceanographers. Because of the physical force called **"surface tension"**, the waters of neighboring seas do not mix. Caused by the difference in the density of their waters, surface tension prevents them from mingling with



Despite the fact that there are large waves, strong currents, and tides in these seas, they do not mingle with one another, nor do they break through the barrier between them. Proven scientifically only very recently, this fact was pronounced in Surat ar-Rahman of the Qur'an 14 centuries ago.



Mediterranean Sea water enters the Atlantic by Gibraltar. But their temperature, salinity, and densities do not change, because of the barrier that separates them.

one another, just as if a thin wall were between them.[68]

The interesting side to this is that during a period when people had no knowledge of physics, surface tension, or oceanography; this was revealed in the Qur'an.

The Sex of the Baby

Until fairly recently, it was thought that a baby's sex was determined by the mother's cells. Or at least, it was believed that the sex was determined by the male and female cells together. But we are given different information in the Qur'an, where it is stated that masculinity or femininity is created out of **"a drop of sperm which has been ejected"**.

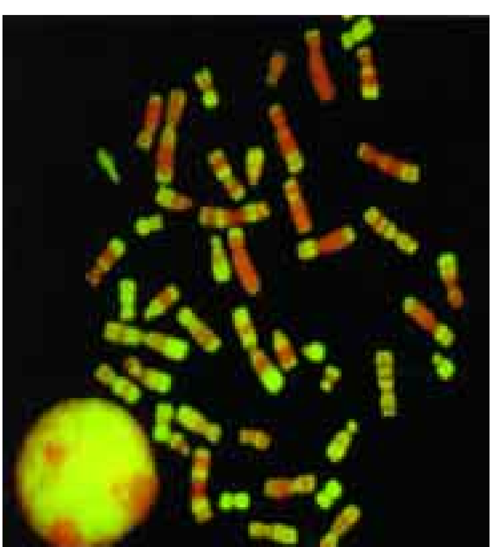


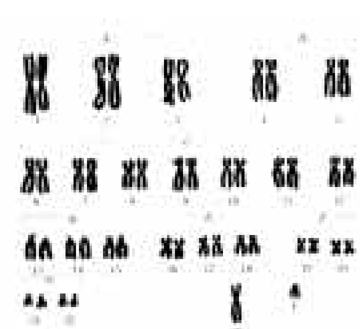
In the Qur'an, it is said that masculinity or femininity are created out of "a drop of semen which has been ejected". However, until fairly recently, it was believed that a baby's sex was determined by the mother's cells. Science only discovered this information given in the Qur'an in the 20th century.

He has created both sexes, male and female from a drop of semen which has been ejected. (Surat an-Najm: 45-46)

Was he not a drop of ejaculated sperm, then a blood-clot which He created and shaped, making from it both sexes, male and female? (Surat al-Qiyama: 37-39)

The developing disciplines of genetics and molecular biology have scientifically validated the accuracy of this information given by God in the Qur'an. It is now understood that sex is determined by the sperm cells from the male, and that the female has no role in this process.





It is the chromosomes that determine the sex.

Chromosomes are the main elements in determining sex. Two of the 46 chromosomes that determine the structure of a human being are identified as the sex chromosomes. These two chromosomes are called "XY" in males, and "XX" in females, because the shapes of the chromosomes resemble these letters. The Y chromosome carries the genes that code for masculinity, while the X chromosome carries the genes that code for femininity.

The formation of a new human being begins with the cross combination of one of these chromosomes, which exist in males and females in pairs. In females, both components of the sex cell, which divides into two during ovulation, carry X chromosomes. The sex cell of a male, on the other hand, produces two different kinds of sperm, one that contains X chromosomes and the other Y chromosomes. If an X chromosome from the female unites with a sperm that contains an X chromosome, then the baby is female. If it unites with the sperm that contains a Y chromosome, the baby is male.

In other words, a baby's sex is determined by which chromosome from the male unites with the female's ovum.

None of this was known until the discovery of genetics in the 20th century. Indeed, in many cultures, it was believed that a baby's sex was determined by the female's body. That was why women were blamed when they gave birth to girls.

Fourteen centuries before human genes were discovered, however, the Qur'an revealed information that denies this superstition, and referred to the origin of sex lying not with women, but with the semen coming from men.

The Embryo Clinging to the Uterus

If we keep on examining the facts announced to us in the Qur'an about the formation of human beings, we again encounter some very important scientific miracles.



When the sperm of the male unites with the ovum of the female, the essence of the baby to be born is formed. This single cell, known as a **"zygote"** in biology, will instantly start to reproduce by dividing, and eventually become a **"piece of flesh"** called an embryo. This of course

can only be seen by human beings with the aid of a microscope.

The embryo, however, does not spend its developmental period in a void. It clings to the uterus just like roots that are firmly fixed to the earth by their tendrils. Through this bond, the embryo can obtain the substances essential to its development from the mother's body.[69]

Here, at this point, a very significant miracle of the Qur'an is revealed. While referring to the embryo developing in the mother's womb, God uses the word *alaq* in the Qur'an:

Recite: In the name of your Lord Who created man from alaq. Recite: And your Lord is the Most Generous. (Surat al-'Alaq: 1-3)

The meaning of the word *alaq* in Arabic is **"a thing that clings to some place"**. The word is literally used to describe leeches that cling to a body to suck blood.

Certainly, the use of such an appropriate word for the embryo developing in the mother's womb, proves once again that the Qur'an is a revelation from God, the Lord of all the Worlds.

The wrapping of muscles over the bones

Another important aspect of the information given in the verses of the Qur'an is the developmental stages of a human being in the mother's womb. It is stated in the verses that in the mother's womb, the bones develop first, and then the muscles form which wrap around them:

(We) then formed the drop into a clot and formed the clot into a lump and formed the lump into bones and clothed the bones in flesh; and then brought him into being as another creature. Blessed be God, the Best of Creators! (Surat al-Muminun: 14)

Embryology is the branch of science that studies the development of the embryo in the mother's womb. Until very recently, embryologists assumed that the bones and muscles in an embryo developed at the same time. Yet, advanced microscopic research conducted by virtue of new

technological developments has revealed that the revelation of the Qur'an is word for word correct.

These observations at the microscopic level showed that the development inside the mother's womb takes place in just the way it is described in the verses. First, the cartilage tissue of the embryo ossifies. Then muscular cells that are selected from amongst the tissue around the bones come together and wrap around the bones.

This event is described in a scientific publication titled *Developing Human* in the following words:

> … [T]he shape of the skeleton determines the general appearance of the embryo in the bones stage during the 7th week; muscles do not develop at the same time but their development follows soon after. The muscles take their positions around the bones throughout the body and therefore Clothe the bones. Thus, the muscles take their well known forms and structures… The stage of clothing with muscle occurs during the 8th week…[70]

In short, man's developmental stages as described in the Qur'an are in perfect harmony with the findings of modern embryology.

Three Dark Stages of the Baby in the Womb

In the Qur'an, it is related that man is created in a three-stage process in the mother's womb:

... He creates you stage by stage in your mothers' wombs in a threefold darkness. That is God, your Lord. Sovereignty is His. There is no god but Him. So what has made you deviate? (Surat az-Zumar: 6)

The expression *fee thulumatin thalathin*, translated into English as "a threefold darkness," indicates three dark regions involved during the development of the embryo. These are:

a) The darkness of the abdomen

b) The darkness of the womb

c) The darkness of the placenta

As we have seen, modern biology has revealed that the embryological development of the baby takes place in the manner revealed in the verse,

in three dark regions. Moreover, advances in the science of embryology show that these regions consist of three layers each.

The lateral abdominal wall comprises three layers: the external oblique, the internal oblique, and transverses abdominis muscles.[71]

Similarly, the wall of the womb also consists of three layers: the epimetrium, the myometrium and the endometrium.[72]

Similarly again, the placenta surrounding the embryo also consists of three layers: the amnion (the internal membrane around the fetus), the chorion (the middle amnion layer) and the decidua (outer amnion layer.)[73]

It is also pointed out in this verse that a human being is created in the mother's womb in three distinct stages. Indeed, modern biology has revealed that the baby's embryological development takes place in three distinct regions in the mother's womb. Today, in all the embryology textbooks studied in faculties of medicine, this subject is taken as an element of basic knowledge. For instance in *Basic Human Embryology*, a fundamental reference text in the field of embryology, this fact is stated as follows: "The life in the uterus has **three stages**: pre-embryonic; first two and a half weeks, embryonic; until the end of the eight week, and fetal; from the eight week to labor."[74]

These phases refer to the different developmental stages of a baby. In brief, the main characteristics of these developmental stages are as follows:

- Pre-embryonic stage

In this first phase, the zygote grows by division, and when it becomes a cell cluster, it buries itself in the wall of the uterus. While they continue growing, the cells organize themselves in three layers.

- Embryonic Stage

The second phase lasts for five and a half weeks, during which the baby is called an "embryo". In this stage, the basic organs and systems of the body start to appear from the cell layers.

- Fetal stage

From this stage on, the embryo is called a "fetus". This phase begins at the eighth week of gestation and lasts until the moment of birth. The distinctive characteristic of this stage is that the fetus looks just like a human being, with its face, hands and feet. Although it is only 3 cm. long

initially, all of its organs have become apparent. This phase lasts for about 30 weeks, and development continues until the week of delivery.

Information on the development in the mother's womb became available only after observations with modern devices. Yet, just like many other scientific facts, these pieces of information are imparted in the verses of the Qur'an in a miraculous way. The fact that such detailed and accurate information was given in the Qur'an at a time when people had scarce information on medical matters is clear evidence that the Qur'an is the word of God.

Mother's Milk

We have instructed man concerning his parents. Bearing him caused his mother great debility and the period of his weaning was two years: "Give thanks to Me and to your parents. I am your final destination." (Surah Luqman: 14)

Mother's milk is an unmatched mixture that is created by God as both an excellent food-source for the newborn baby, and a substance that increases its resistance to diseases. The balance of the nutriments in mother's milk is at ideal levels, and the milk is in the ideal form for the baby's as yet immature body. At the same time, mother's milk is also very rich in nutrients which accelerate the growth of brain cells and the development of the nervous system.[75] Even artificial baby food produced by today's technology cannot substitute for this miraculous source of nutrition.

The list of advantages to the baby provided by mother's milk is being added to every day. Research has shown that babies fed mother's milk are particularly protected against infections concerning the respiratory and digestive systems. That is because the antibodies in mother's milk provide a direct defense against infection. Other anti-infection properties of mother's milk are that it provides a hospitable environment for "good" bacteria called "normal flora" and constitutes a barrier to harmful bacteria, viruses and parasites. Furthermore, it has also been established that there are factors in mother's milk which order the immune system against infectious diseases and allow it to function properly.[76]

Since mother's milk has been specially designed it is the most easily digestible food for babies. Despite being nutritionally very rich, it is easily digested by the baby's sensitive digestive system. Since the baby thus expends less energy on digestion it is able to use that energy for other bodily functions, growth and organ development.

The milk of mothers who have had premature babies contains higher levels of fat, protein, sodium, chloride and iron to meet the baby's needs. Indeed, it has been established that the functions of the eye develop better in premature babies fed on mother's milk, and that they perform better in intelligence tests, as well as a great many other advantages.

Another new scientific discovery regarding mother's milk is that it is most beneficial to the baby for two years.[77] This important information discovered by science only recently was revealed to us by God in the verse **"… his weaning was two years…"** 1400 years ago.

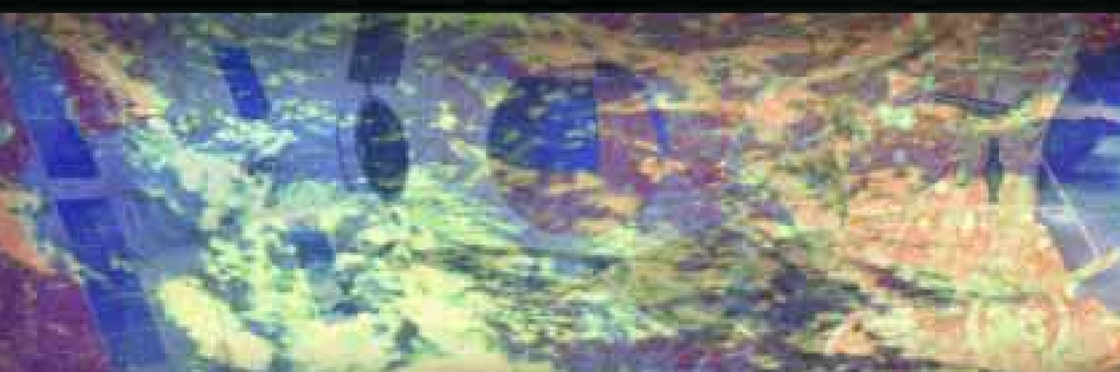
Conclusion

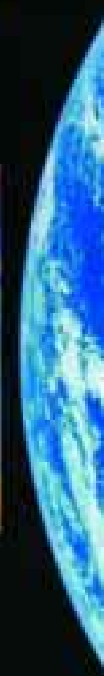
All that we have seen so far shows us one clear fact: the Qur'an is such a book that all the news related in it has proved to be true. Facts about scientific subjects and the news given about the future, facts that no one could have known at the time, were announced in its verses. It is impossible for this information to have been known with the level of knowledge and technology of the day. It is clear that this provides clear evidence that the Qur'an is not the word of man. The Qur'an is the word of the Almighty God, the Originator of everything and the One Who encompasses everything with His knowledge. In one verse, God says on the Qur'an **"If it had been from other than God, they would have found many inconsistencies in it." (Surat an-Nisa': 82)** Not only are there no inconsistencies in the Qur'an, but every piece of information it contains reveals the miracle of this Divine Book more and more each day.

What falls to man is to hold fast to this Divine Book revealed by God, and receive it as his one and only guide. In one of the verses, God commands us:

And this is a Book We have sent down and blessed, so follow it and have fear of God so that hopefully you will gain mercy. (Surat al-An'am: 155)

Book Two







SCIENTISTS OF FAITH

No matter how obstinate materialists and atheists may be, a single truth remains evident: God created all forms of life and systems that make up the topics of science. Therefore, it is certain that science and religion are reconcilable, so long as they are practiced honestly and sensibly. A mark of this apparent agreement is the "scientists of faith", of past and present, who have all made significant contributions to humanity.

A scientist, who practices science, makes new discoveries, and works to unravel the mysteries of the universe, is actually an individual investigating the artistry of God in-depth, trying to detect the details therein. That is why religion and science are an inseparable unit. A scientist is one who makes evident God's infinite power and the artistry and uniqueness in His creation. For this reason, scientists, contrary to popular belief, can perceive the existence and unity of God most immediately, as they are the ones immersed in the study of the objects of God's creation.

Not surprisingly, there are a great number of scientists who have made important contributions to science by using the free-thought and broad-mindedness provided them through religion. These individuals not only demonstrated that science and religion are fully compatible, but also served science and humanity in the greatest way. Noted scientists such as Newton, Kepler, Leonardo da Vinci, and Einstein, who were the pioneers of science, believed, as a result of their observations and research, that the universe was created and ordered by God and is governed under His control. Moreover, it was men of faith who founded the principles upon which science is based, and thus, religion played a critical role in its advent.

The outlook on the cosmos of Isaac Newton, considered the greatest scientist of all times, is implicit in these following words:

This most beautiful system of the sun, planets, and comets could **only**

proceed from the counsel and dominion of an intelligent and powerful Being. This Being governs all things... as Lord over all, and on account of His dominion. He is wont to be called Lord God, Universal Ruler.[78]

It is a known fact that Kepler's scientific achievements sprang from his religious faith. Arno Penzias, 1978 winner of the Nobel Prize in physics, and co-discoverer of cosmic background radiation, had this to say about Kepler:

That really goes back to the triumph, not of Copernicus, but really the triumph of Kepler. That's because, after all, the notion of epicycles and so forth goes back to days when scientists were swapping opinions. All this went along until we had **a true believer and this was Kepler**. …**He really believed in God the Lawgiver.** …And he said there's got to be something simpler and more powerful. Now he was lucky or maybe there was something deeper, but Kepler's faith was rewarded with his laws of nature. And so from that day on, it's been an awful struggle, but over long centuries, we find that very simple laws of nature actually do apply. And so that expectation is still with scientists. And it comes essentially from Kepler, and **Kepler got it out of his belief…**[79]

In this part of the book, we will cover the scientists of faith, from the past to the present, who founded and developed modern science, as well as their contributions to science. All the scientists included in this part believed that the cosmos and all forms of life were created by God. Francis Bacon's words portray the regard of a scientist of faith for all created beings:

For as all works do shew forth the power and skill of the workman,… so it is of the works of God; which do shew the omnipotency and wisdom of the maker.[80]

In His verses, God states that one of the ways to acquire the ability to think about creation, to fear God, to recognize creation as due to Him, and to grasp His omnipotence and omniscience is "having knowledge":

The metaphor of those who take protectors besides God is that of a spider which builds itself a house; but no house is flimsier than a spider's house, if they only knew. God knows what you call upon besides Himself. He is the Almighty, the All-Wise. Such metaphors – We devise them for mankind; but only those with knowledge

understand them. God created the heavens and the earth with truth. There is certainly a Sign in that for the believers. (Surat al-'Ankabut: 41-44)

Among His Signs is the creation of the heavens and earth and the variety of your languages and colors. There are certainly Signs in that for those who know. (Surat ar-Rum: 22)

God bears witness that there is no deity but Him, as do the angels and the people of knowledge, upholding justice. There is no deity but Him, the Almighty, the All-Wise. (Surat Al 'Imran: 18)

But those of them who are firmly rooted in knowledge, and the believers, believe in what has been sent down to you and what was sent down before you: those who keep up prayer (salat) and pay the welfare tax (zakat), and believe in God and the Last Day – We will pay such people an immense wage. (Surat an-Nisa': 162)



SCIENTISTS OF FAITH WHO LIVED IN THE PAST

Roger Bacon (1220 - 1292)

"The grace of faith illuminates greatly."[81]

Called **Doctor Mirabiles** (Wonderful Doctor) by his contemporaries, Roger Bacon was a British scientist and theologian who laid great emphasis on the experimental method, and put an end to many archaic customs practiced in the science of his time. Bacon foresaw a number of technological breakthroughs that were to come hundreds of years later, which were hard to even fathom at the time. Steamboats, trains, cars, planes, cranes, and suspension bridges are only some of the innovations he anticipated in the 13th century.

In a letter to a friend, Bacon wrote:

> First, by the figurations of art there be made instruments of navigation without men to row them, as great ships to brooke the sea, only with one man to steer them, and they shall sail far more swiftly than if they were full of men; also chariots that shall move with unspeakable force without any living creature to stir them.[82]

Believing that light was created by God to enable man to see, Bacon conducted observations in this field. He defined the magnifying characteristic of optic lenses and their places of usage. He was the first to note that the light emitted by stars does not reach the Earth



Bacon, who, back in the 13th century, anticipated numerous technological innovations, said "Then this science as regards the commonwealth of believers is useful, as we saw in its special knowledge of the future, present, and past."

simultaneously. Finally, Bacon maintained that the Earth was not flat but round, some 200 years prior to Christopher Columbus, and that India could be reached by sailing west from Europe.

Believing that the conclusions he arrived at in his observations were useful to men of faith, Bacon said:

> Then this science as regards the commonwealth of believers is useful, as we saw in its special knowledge of the future, present, and past.[83]

Bacon, as a scientist, argued that science did not conflict with religion, but rather could serve as an important tool to help convince unbelievers. He stated that **"this science is of the greatest advantage in persuading men to accept the faith."**[84]

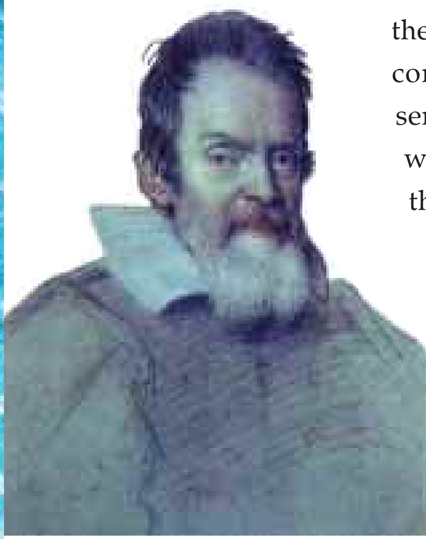

Francis Bacon

Francis Bacon (1561-1626)

Bacon, reputed scientist, and one of the founders of the scientific method, is known to have been a devout believer in God. He stated in Novum Organum that natural philosophy (science) is "after the word of God, the surest remedy against superstition, and the most approved support of faith."[85]

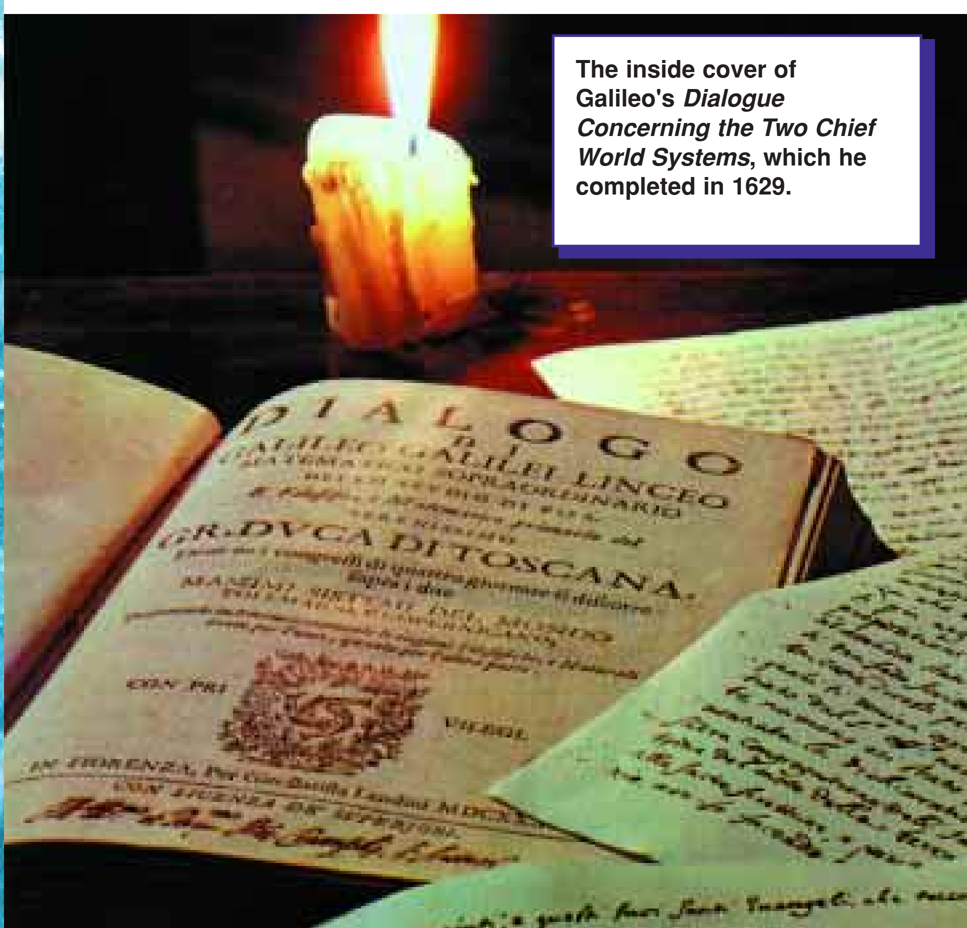
Galileo Galilei (1564-1642)

Galileo Galilei is the first person to have used the telescope to observe the sky. Galileo maintained that the Earth is round, and was the first to detect the dark regions, craters, and hills of



Galileo Galilei

the Moon. Galileo, famous for his immense contribution to science, believed that the senses, the ability to talk and intelligence, were granted to people by God, and that they ought to be exercised in the best way possible. He maintained that it was all too obvious that Nature was designed by God. He said that nature was simply another book written by God, and contended that the truths of science and the truths of faith cannot impugn one another since God is the author of all truth.[86]



The inside cover of Galileo's *Dialogue Concerning the Two Chief World Systems*, which he completed in 1629.



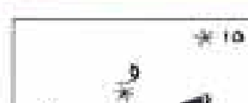




Galileo maintained that the Earth is round, and was the first to detect the dark regions, craters, and hills of the Moon.

Bottom: Two of Galileo's first telescopes in the Museum of Science, Florence. The other picture shows the convex lens of the telescope.





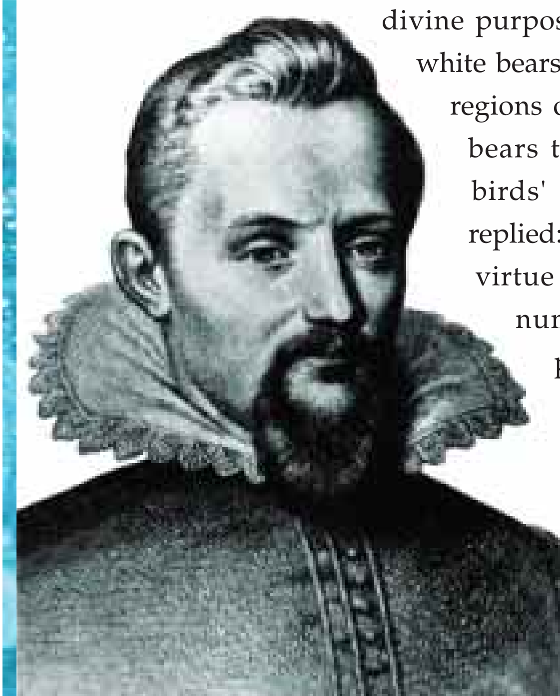
Johannes Kepler (1571 - 1630)

Since we astronomers are priests of the highest God in regard to the book of nature, it befits us to be thoughtful, not of the glory of our minds, but rather, above all else, of the glory of God.[87]

Kepler, the founder of modern astronomy, discovered the elliptical movement of the planets, established a formula for relating a planet's orbital period to its mean distance from the sun, and completed astronomical tables that allow calculations of planetary positions for any time in the past or future.

As a scientist, Kepler also believed that the universe was created by a Creator. When he was asked why he practiced science, he said "I had the intention of becoming a theologian... but now I see how God is, by my endeavors, also glorified in astronomy, for 'heavens declare the glory of God'".[88]

The life of Kepler, who believed that God's glory was manifested in everything He created, is an example to how successful and broad-thinking a scientist who admits that there is a divine purpose in nature can be. "Who gave white bears and white wolves to the snowy regions of the North, and a food for the bears the whale, and for the wolves, birds' eggs?" asked Kepler and then replied: "Great is our Lord and great His virtue and of his wisdom there is no number: praise Him, ye heavens, praise Him, ye sun, moon, and planets, use every sense for perceiving, every tongue for declaring your Creator. Praise Him, ye celestial Harmonies, praise Him, ye judges of the Harmonies uncovered: and thou my soul, praise the Lord thy Creator, as long as I shall



Johannes Kepler



be: for out of Him and through Him and in Him are all things, both the sensible and the intelligible; for both whose whereof we are utterly ignorant and those which we know are the least part of them; because there is still more beyond. To him be praise, honor, and glory, world without end."[89]

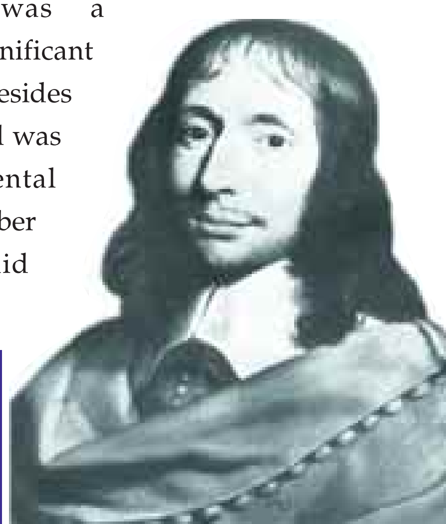
Johannes Baptista von Helmont (1579 - 1644)

Founder of pneumatic chemistry and chemical physiology, Helmont invented the thermometer and barometer. Walter Pagels, who wrote a book on the religious aspects of van Helmont's science, stated that he drew inspiration from his religious beliefs in his researches.[90]

Blaise Pascal (1623 - 1662)

Contributing to the greatest innovation in geometry since the time of the Ancient Greeks, Pascal was a distinguished scientist, who made significant discoveries from early on in his life. Besides his contribution to mathematics, Pascal was also responsible for monumental discoveries in physics. He made a number of studies in atmospheric and fluid

Many scientists noted for their discoveries were also known for their faith in God. Helmont, who invented the thermometer and barometer, and Pascal, right, were two such scientists.



Blaise Pascal

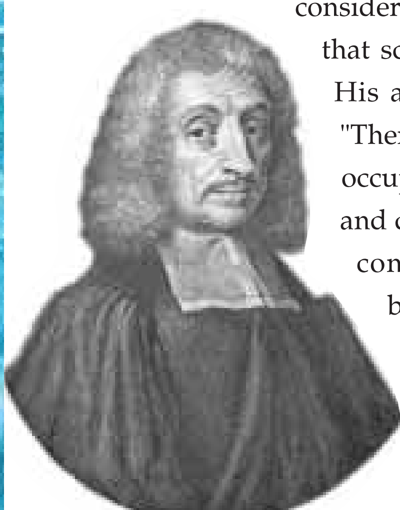
mechanics, and proved that atmospheric pressure varies according to altitude.

An eminent figure in the history of science, Pascal was also a deeply spiritual man. He referred to the eternal power of God when he said that God is the Creator of everything from mathematics to the order of the elements.[91]

John Ray (1627-1705)



Reputed British botanist, John Ray, was a man of faith. He felt that if man were placed on earth to mirror back to God the glory of all His works, then he ought to take notice of every created thing. In his early years, spurred on by this outlook, Ray engaged himself in scientific research. He was the great authority of his day in both botany and zoology. He wrote a well-received book, *The Wisdom of God in Creation*. In this book, in which Ray introduced thousands of plants, insect, bird, fish species, and the like, he reported that nature reveals the existence of a Creator. God's works of creation, he said, were "the works created by God at first, and by Him conserved to this day in the same state and condition in which they were first made."[92] Ray, who made a considerable contribution to botany, always stressed that science and religion intersect in many ways. His attitude is best understood by his words: "There is for a free man no occupation more worth and delightful than to contemplate the beauteous works of nature and honor the infinite wisdom and goodness of God."[93]



John Ray



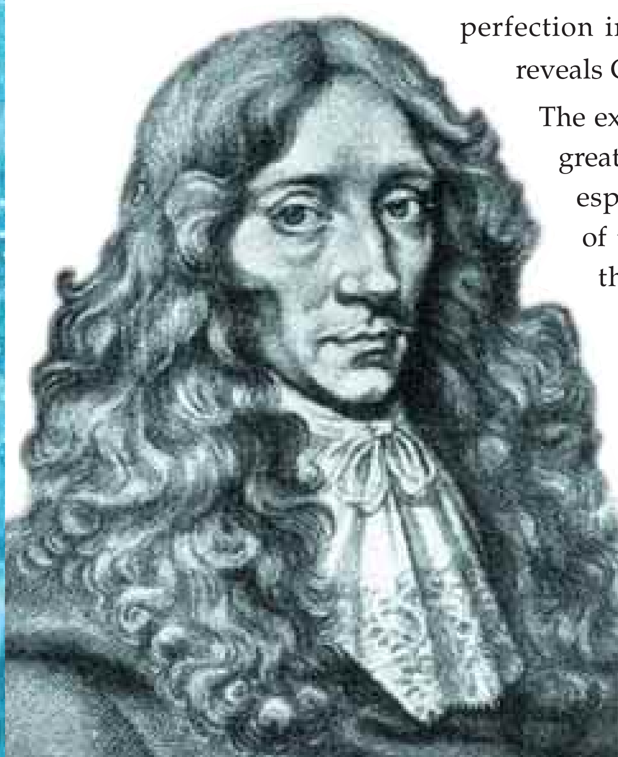
Robert Boyle (1627 - 1691)

Regarded as the father of modern chemistry, Boyle made a number of revolutionary scientific discoveries. He established the relationship between changes in the pressure applied to air and the volume air occupies, which became known today as "Boyle's law of gasses". His other inventions included a kind of litmus paper and a primitive refrigerator. He demonstrated that water expanded when it froze. The modern definition of "element" was given by him, and he contributed to the theory of atomism, arguing that if air is compressible there must be void between its particles.

While responsible for such great scientific discoveries, Boyle was a devout believer in God. He believed there to be an intelligent design in nature, which was created by an all-powerful Creator. Boyle taught in his lectures and writings that science and belief in God should stand side by side. In a lecture, he was to have said: "Remember to give glory to the one who authored nature… Use knowledge to bring good to mankind."[94]

Elsewhere, he commented that the perfection in living things explicitly reveals God's existence:

> The excellent contrivance of that great system of the world, and especially the curious fabric of the bodies of animals and the uses of their sensories and other parts, have been made the great motives that in all ages and nations induced philosophers to acknowledge a Deity as the author of these admirable structures.[95]



Robert Boyle

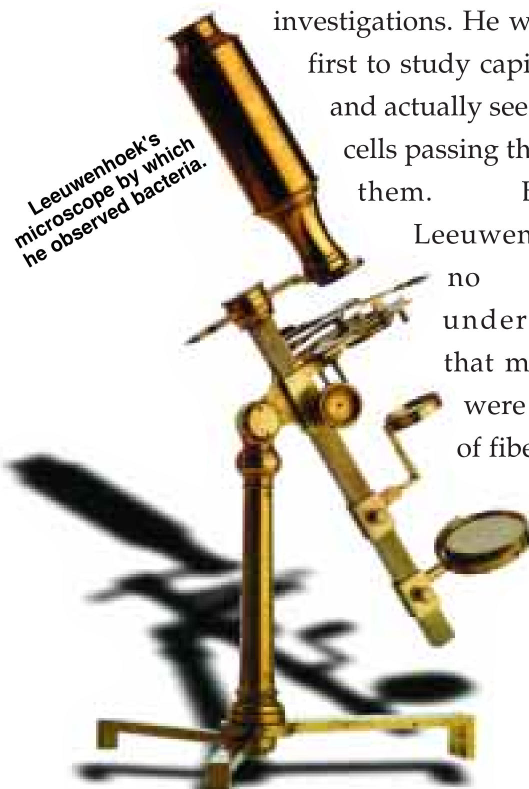
Antonie von Leeuwenhoek (1632 – 1723)

It was Leeuwenhoek who discovered bacteria. Leeuwenhoek learned to grind his own magnifying lenses to examine cloth. Intrigued by what he saw, he began producing other magnifiers – and became the first man to see and describe bacteria through a microscope.

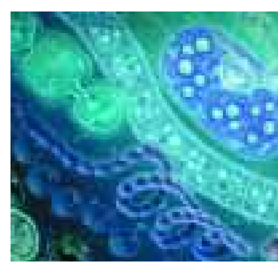
His goal to refute the idea of spontaneous generation without a Creator led him to conduct important scientific studies. To this purpose, he studied the nutrient systems of plants and animals, he examined spermatozoa, the transportation of nutrients in plants, and the structure and function of various parts of plants. Blood cells also became subjects of his investigations. He was the first to study capillaries and actually see blood cells passing through them. Before Leeuwenhoek, no one understood that muscles were made of fibers.[96]



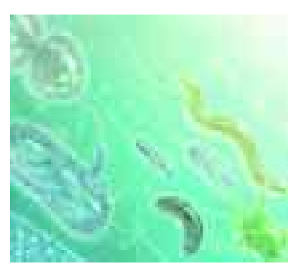
Antonie von Leeuwenhoek



Leeuwenhoek's microscope by which he observed bacteria.



Bacteria types



Bacteria types



Blood Cells

Isaac Newton (1642 - 1727)

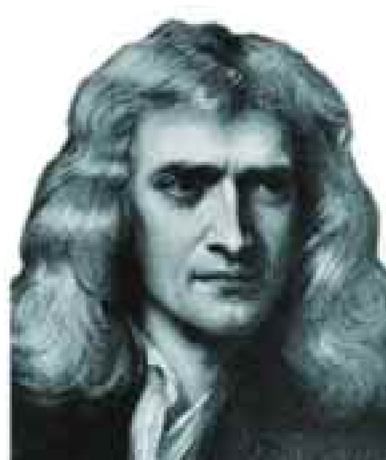
Considered the greatest scientist who ever lived, Newton was both a mathematician and a physicist. His greatest contribution to science was his discovery of the law of universal gravitation. He added the concept of mass to the relation between force and acceleration; introduced the law of action and reaction, and put forward the thesis that a moving object will continue moving in straight line at a constant speed unless acted on by a force. Newton's laws of motion remained applicable for four centuries, from simplest engineering calculations to the most complex technological projects. Newton's contributions were not limited to gravity, but also extended to the fields of mechanics and optics. Discovering the seven colors of light, Newton thus laid the ground for a new discipline, namely optics.

In addition to his groundbreaking discoveries, Newton wrote critical essays refuting atheism and defending Creation. He supported the idea that "creation is the only scientific explanation". Newton believed that the mechanic universe, a gigantic clock working non-stop, in his analogy, could only be the work of an all-powerful and all-wise Creator.

Behind Newton's discoveries, which changed the course of the world, was his desire to come closer to God. Newton investigated the objects of God's creation to know Him better. To this end, he devoted

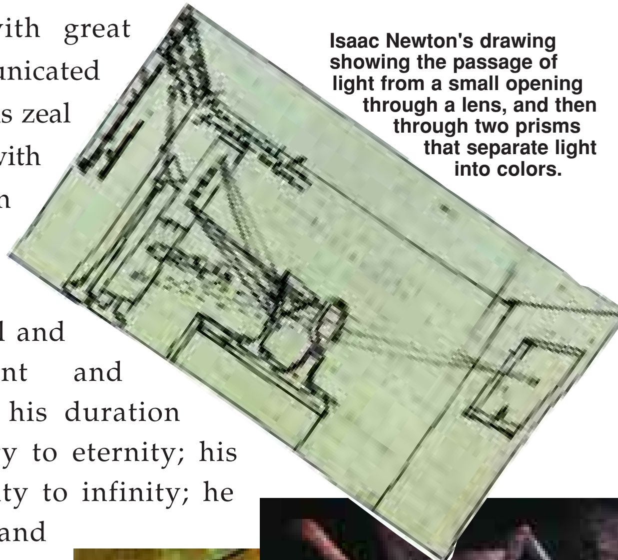
Principia Mathematica





himself to studies with great energy. Newton communicated the reason underlying his zeal for scientific endeavor with the following words, in his famous work *Principia Mathematica*:

> ...He (God) is eternal and infinite, omnipotent and omniscient; that is, his duration reaches from eternity to eternity; his presence from infinity to infinity; he governs all things, and knows all things that are or can be done. He is …eternal and infinite; …he endures and is present. He endures forever, and is everywhere present; and, by existing always and everywhere, he constitutes duration and space... We know him only by his most wise and excellent contrivances of things... [W]e reverence and adore him as his servants…[97]



Isaac Newton's drawing showing the passage of light from a small opening through a lens, and then through two prisms that separate light into colors.





The above picture shows Newton separating light into a spectrum of colors with the use of a prism.


John Flamsteed

John Flamsteed (1646-1719)

He was the founder of the famous Greenwich observatory and the first astronomer royal of England. Flamsteed, who, after innumerable observations, produced the first great star map of the telescopic age, was also a devout clergyman.

John Woodward (1665-1728)

Woodward was one of the great founding fathers of the science of geology. One of Woodward's valuable contributions was the establishment of an important paleontological museum at Cambridge, and the geology branch there.

Carolus Linnaeus (1707-1778)

Linnaeus, a scientist of great piety, conducted very important studies in botany. He proved that plants reproduce sexually, and introduced to science the notion of "biological taxonomy".

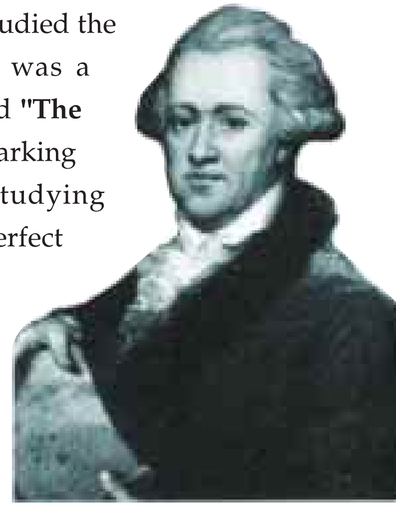
Jean Deluc (1727-1817)

Deluc was a Swiss physicist who coined the term "geology". He and his father developed the modern mercury thermometer and the hygrometer. He is known for his belief in creation, and for his challenge to the idea that the universe and life came about by coincidence.

Sir William Herschel (1738-1822)

Herschel was one of the most accomplished astronomers of the 18th century. Herschel, who constructed the most advanced reflecting

telescopes of his day, and cataloged and studied the nebulae and galaxies as never before, was a scientist of faith. It was Herschel who said **"The undevout astronomer must be mad"**, remarking that it is astounding that a scientist studying astronomy, and bearing witness to the perfect order in the universe, could not believe in God.[98]

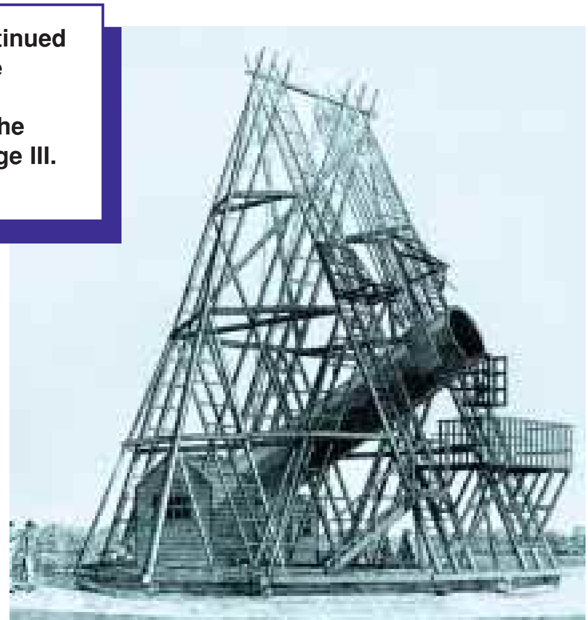


William Paley

William Paley (1743 - 1805)

Paley was a scientist who believed in creation. His work *Natural Theology* was one of the best-selling books of his time. Paley felt that "if works of art are products of man, then living things must be the product of a being far superior to man". According to Paley, the fact that all living things are equipped with all kinds of features they need to survive in their habitat is a "mark of contrivance, in proof of design, and of a designing Creator."[99]

Sir William Herschel continued his observations with the telescopes he devised, supported by the grants he received from King George III.



George Cuvier (1769 - 1832)



George Cuvier

Cuvier was one of the greatest anatomists and paleontologists. He is considered to be the founder of the science of comparative anatomy, and one of the chief architects of paleontology as a separate scientific discipline. He was a firm creationist, even participating in important creation/evolution debates.[100]

Humphrey Davy (1778 - 1829)

Known as a man of faith, Davy was one of the great chemists of his day, and the man under whom Faraday served as apprentice. He was the first to isolate many important chemical elements, to develop the motion theory of heat, to invent the safety lamp, and to demonstrate that diamonds are carbon, along with many other pivotal contributions.



Humphrey Davy

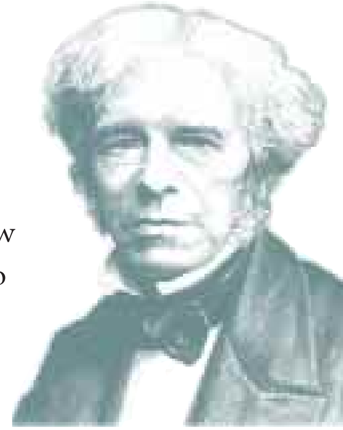
Adam Sedgwick (1785 - 1873)

One of England's leading 19th century geologists, Sedgwick, is especially famous for identifying and naming the major rock systems known as Cambrian and Devonian. He was also a clergyman, and although he was a friend of Charles Darwin, he always opposed his evolutionary ideas.[101]



Adam Sedgwick

Michael Faraday (1791 - 1867)



Michael Faraday

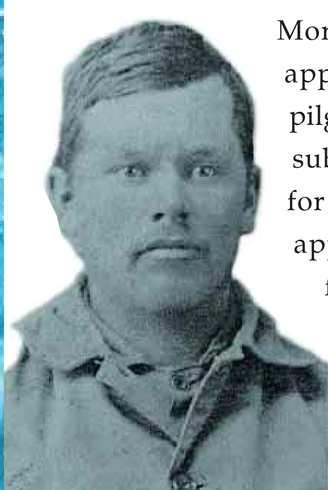
Universally acknowledged as one of the greatest physicists of all time, Faraday was especially gifted with developing the new sciences of electricity and magnetism. He also made key contributions in the field of chemistry.

Faraday was a scientist who believed in the existence of a Creator, and that science and religion are in harmony. **Because one God created the world**, he believed, **all of nature must be interconnected as a single whole**. Based on this idea, he concluded that electricity and magnetism must be interlinked.[102]

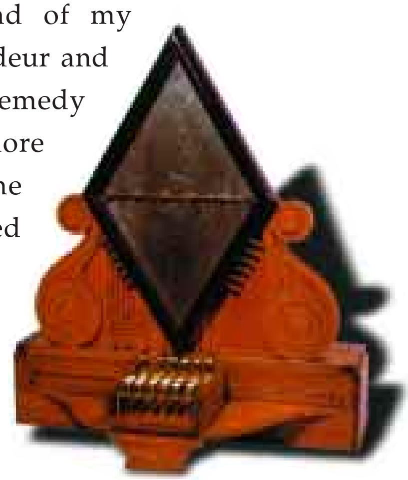
Samuel Morse (1791 - 1872)

Morse was a remarkable scientist known for his invention of the telegraph. He also built the first camera in America.

Morse believed in the existence of a Creator who created everything for a certain cause. He felt that the material world and the spiritual world work in harmony. Just four years before he died, Morse wrote: "The nearer I approach to the end of my pilgrimage, the grandeur and sublimity of God's remedy for fallen man are more appreciated and the future is illumined with hope and joy."[103]



Samuel Morse



Joseph Henry (1797-1878)

The great American physicist and devout scientist, Joseph Henry, was a professor at Princeton University. Henry, who invented the electromagnetic motor and the galvanometer, had made it a regular habit to stop to worship God, and then to pray for divine guidance, at every important juncture of an experiment, in all his experimentation.[104]

Louis Agassiz (1807-1873)


Louis Agassiz

Agassiz, widely recognized as the greatest American biologist, was an inveterate opponent of evolutionism.

Agassiz saw the divine plan of God everywhere in nature, and could not reconcile himself to a theory that did not acknowledge design. As he wrote, in his *Essay on Classification*:

> The combination in time and space of all these thoughtful conceptions exhibits not only thought, it shows also premeditation, power, wisdom, greatness, prescience, omniscience, providence. In one word, all these facts in their natural connection proclaim aloud the One God, whom man may know, adore, and love.[105]

James Prescott Joule (1818-1889)


James Prescott Joule

Besides his discovery of the first law of thermodynamics, Joule also showed how to calculate the heat produced by an electric current moving through a wire, and was the first to calculate the velocity of a gas molecule. His greatest discovery was the value of the constant known as the "mechanical equivalent of heat". This discovery led to the formulation of the law of conservation of energy, the most basic and universal of all scientific laws.

Joule, as the discoverer of these important scientific laws, was a scientist who believed that he could come closer to God as he came to know the laws of nature. His belief urged him to proceed with further investigations. He was one of the 717 scientists who signed a manifesto against Darwin in 1864. He expressed his beliefs about science in these terms:

> After the knowledge of, and obedience to, the will of God, the next aim must be to know something of His attributes of wisdom, power and goodness as evidenced by his handiwork. It is evident that an acquaintance with natural laws means no less than an acquaintanceship with the mind of God therein expressed.[106]

George Gabriel Stokes (1819 - 1903)

George Stokes was a great British physicist and mathematician, who made major contributions in a number of fields. He expanded the knowledge of gravitational discrepancies, astrophysics, chemistry, sonic problems, and heat. He showed that unlike glass, quartz is transparent to ultraviolet radiation. With Lord Kelvin, he was one of the first to appreciate the electro-thermodynamic explorations of James Joule. Stokes showed that X-rays were also part of Maxwell's electromagnetic spectrum. For a time, Stokes was president of the Victoria Institute of London, and an active member of the Cambridge Philosophical Society.

He was a scientist who investigated nature with a belief in the Creator, and he wrote specifically emphasizing his belief in God. In one of his works, he said that "the laws of nature are carried out in accordance with his will, he who willed them may will their suspension"[107]

Rudolph Virchow (1821 - 1902)

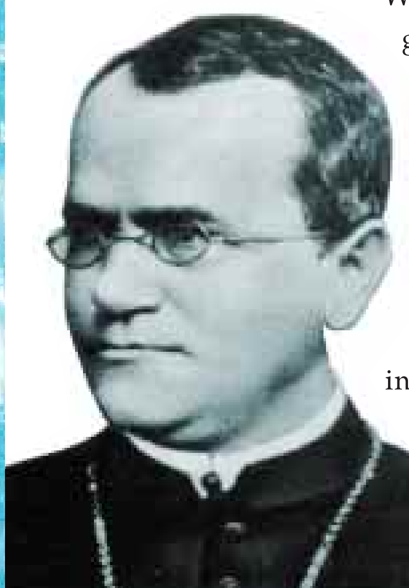
Virchow's main scientific contributions were in the field of medicine. He is considered the father of modern pathology and of the study of cellular diseases. He was the first to describe leukemia, and was active in anthropological and archeological research. Virchow was one of the most

renowned scientists to strongly oppose the evolutionary teachings of Darwin and Haeckel. He also entered actively into politics and fought vigorously against allowing evolutionist teaching in the schools of Germany.[108]

Gregory Mendel (1822-1884)

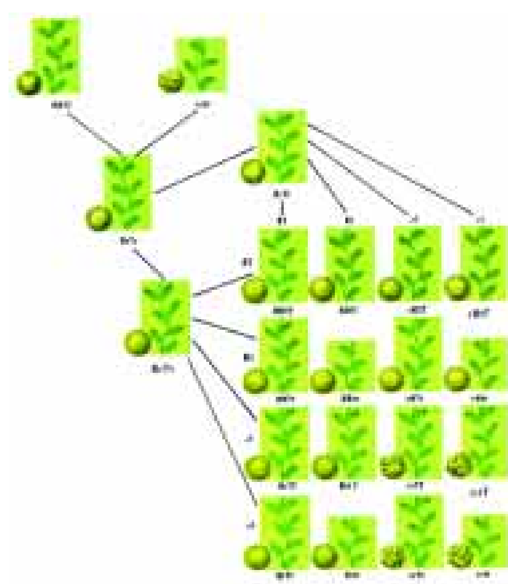
With his discovery of the three laws of genetics, Mendel went down in history as the person who founded the principles of inheritance. Mendel's principles of inheritance have turned out to be the most compelling proofs exposing the fallacy of the theory of evolution.

Having refuted the theory of evolution with his discovery of the principles of inheritance, Mendel further believed that God had created the world, and that blind chance could not be responsible for the outcome.[109]



Gregory Mendel

Gregory Mendel derived the laws of inheritance from his experiments on garden peas. Mendel, also a monk, put Darwin's theory of evolution into a quandary with his discovery.



Louis Pasteur (1822-1895)

Pasteur is one of the greatest figures in the history of science and medicine, chiefly because of his establishment of the germ theory of disease, and his strong opposition to the theory of evolution. He was the first to explain the organic basis and control of fermentation, and as his research led him further and further into bacteriology, he isolated a number of disease-producing organisms, and developed vaccines to combat them – notably the dreaded diseases of rabies, diphtheria, anthrax, and others – as well as the processes of pasteurization and sterilization.

Louis Pasteur

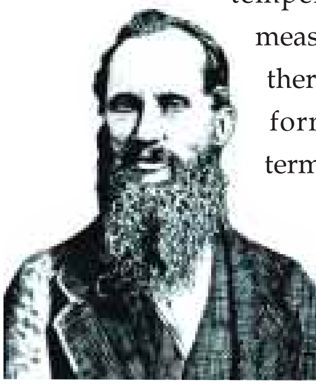


Pasteur, who was a firm believer in God, was the object of fierce opposition because of his resistance to Darwin's theory of evolution. He was a defender of the compatibility of science and religion, which he would often emphasize in his writings. As he put it:

> The more I know, the more does my faith approach that of the Breton peasant (i.e., the faith which is serene, complete, unquestioning)[110]
>
> Little science takes you away from God but more of it takes you to Him.[111]

William Thompson (Lord Kelvin) (1824-1907)

Lord Kelvin is recognized as the leading physicist of his time, and is also known for his strong faith in God. He is held in high regard in the scientific community for his contributions to physics and mathematics, as well as his practical inventions. He developed a successful method to liquefy hydrogen and helium. He established the scale of absolute



William Thompson

temperatures, so that such temperatures are today measured as so many "degrees Kelvin". He established thermodynamics as a formal scientific discipline, and formulated its first and second laws in precise terminology.

He openly espoused his faith in God in his works. He said:

> Do not be afraid to be free thinkers. If you think strongly enough, you will be forced by science to the belief in God.[112]

> With regard to the origin of life, science... positively affirms creative power.[113]

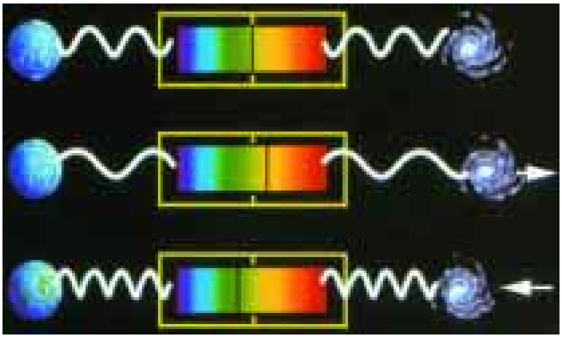
J. J. Thomson (1856-1940)

In 1897, J. J. Thomson discovered the electron. He was a professor of physics at Cambridge University. Thomson, who was a devoutly religious man, made this statement in *Nature*, drawing attention to the fact that the conclusions reached by science point to the existence of God:

> In the distance tower still higher [scientific] peaks which will yield to those who ascend them still wider prospects and deepen the feeling whose truth is emphasized by every advance in science, that great are the works of the Lord.[114]

Sir William Huggins (1824-1910)

Huggins was well known both as a scientist of faith and as a brilliant astronomer. He was the first to demonstrate that stars were comprised mostly of hydrogen, along with smaller amounts of the same elements existing on Earth. He was also the first to identify the Doppler effect (that the light of stars shift from red to blue as they move away from each other) in astronomy, which led to the idea of the expanding universe.

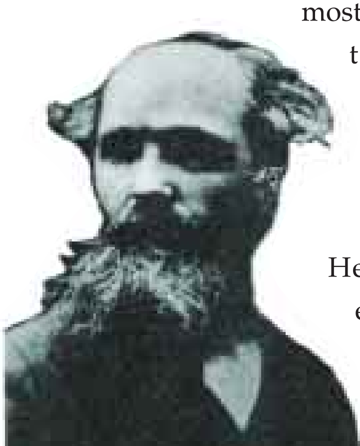


According to the Doppler effect, the spectrum of light waves change in direct proportion to a galaxy's distance to the Earth. This picture shows this change. Sir Huggins, who was the first to identify the Doppler effect, was a scientist who believed in God.

Joseph Clerk Maxwell (1831 - 1879)

Maxwell lived a short, but uniquely productive life. Recognized as the father of modern physics, Maxwell demonstrated the unity of light and electricity, bringing light, electricity, and magnetism together under one set of equations. Einstein relied on Maxwell's equations to formulate the theory of relativity.

Albert Einstein called Maxwell's achievement "the most profound and most fruitful that physics has experienced since the time of Newton." He was strongly opposed to evolution, and was able to develop a thorough mathematical refutation of the famous "nebular hypothesis" of the French atheist LaPlace. He also wrote an incisive refutation of the evolutionary philosophies of Herbert Spencer, the great advocate of Darwinism. In a letter he mused that the scientist of faith has an obligation to conduct such work as will benefit religion.[115]



Joseph Clerk Maxwell

John Strutt (1842 - 1919)

John Strutt pursued studies on the motions of electromagnetic waves,

making noteworthy contributions in optics, sonics, and gas dynamics. He was the co-discoverer of argon and the rare gases. He was also well known as a devout believer. As a prefix to his published papers he wrote:

"The works of the Lord are great".[116]



George Washington Carver

George Washington Carver (1865 - 1943)

Agriculture became a very important discipline beginning from the turn of the 19th century. Carver was a noted agricultural researcher who made a number of critical discoveries.

Carver was known for his belief in God, to which he almost always referred to in his speeches and interviews. As he told a reporter for the *Atlanta Journal* who questioned him about the permanency of the clay paints he had developed: "All I do is prepare what God has made, for uses to which man can put it. It is God's work-not mine."[117]

Sir James Jeans (1877 - 1946)

Prominent physicist Sir James Jeans believed that the universe was created by a Creator of infinite Wisdom. Some of the statements in which he elaborated his views are:

> We discover that the Universe shows evidence of a designing or controlling Power that has something in common with our own minds.[118]

> A scientific study of the universe has suggested a conclusion which may be summed up . . In the statement that the universe appears to have been designed by a pure mathematician.[119]



Albert Einstein (1879 - 1955)

Albert Einstein, who is one of the most important scientists of the last century, was also known for his faith in God. He did not hesitate to defend that science could not exist without religion. As he put it:

> I cannot conceive of a genuine scientist without that profound faith. The situation may be expressed by an image: science without religion is lame.[120]

Einstein was convinced that the universe was too perfectly designed to have come into being by chance, and that it was created by a Creator with Superior Wisdom.

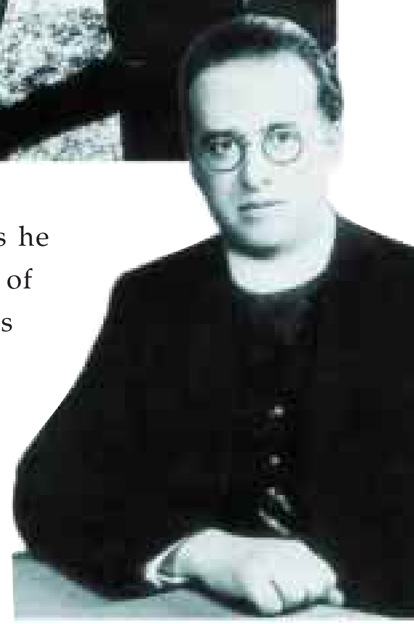
Albert Einstein was one of the greatest scientists in history. Einstein is also known for his faith in God as well as his important discoveries.



Lemaître, seen with Einstein, was a religious scientist who propounded the Big Bang theory that points to the creation of the universe.

For Einstein, who often referred to his belief in God in his writings, wonder at the natural order in the universe was very important. In one of his writings he mentioned, "In every true searcher of Nature there is a kind of religious reverence".[121] Elsewhere, he wrote:

> Everyone who is seriously involved in the pursuit of science becomes convinced that a spirit is manifest in the laws of the Universe – a spirit vastly superior to that of man... In this way the pursuit of science leads to a religious feeling of a special sort...[122]



George Lemaître

Georges Lemaitre (1894-1966)

Georges Lemaître propounded the Big Bang theory that points to the creation of the universe. He thought that the universe has a distinct

beginning, will have an end, and that the recognition of this fact plays a critical role in helping many people to believe in God. Lemaître, who was also a priest, believed that science and religion would lead to the same truth.[123]

Sir Alister Hardy (1896-1985)

Hardy was the founder of modern ocean science. The Templeton Foundation, which each year recognizes a scientist for his or her contribution to progress in religion, honored Sir Alister Hardy in 1985, for empirical studies that for the first time scientifically investigated religious experiences.



Wernher von Braun (1912 - 1977)



Wernher von Braun was one of the world's top scientists. He was a leading German rocket engineer, and developed the famed V-2 rocket during World War II.

Dr. Braun, a former director of NASA, was also a scientist with a strong faith. In the foreword to an anthology on creation and design in nature, he offered this testimony:

Manned space flight is an amazing achievement, but it has opened for mankind thus far only a



Wernher von Braun (arm bandaged) was a leading German rocket engineer. He developed the V-2 rocket in World War II seen in the picture above. Dr. Braun was one of the leading scientists of his day.



Dr. Braun, a firm believer, is seen here with the former US President John F. Kennedy. Dr. Braun said he found it difficult to understand that a scientist could not acknowledge the presence of God.

tiny door for viewing the awesome reaches of space. An outlook through this peephole at the vast mysteries of the universe should only confirm our belief in the certainty of its Creator. I find it as difficult to understand a scientist who does not acknowledge the presence of a superior rationality behind the existence of the universe as it is to comprehend a theologian who would deny the advances of science.[124]

In May of 1974, Wernher von Braun, in a published article, stated:

One cannot be exposed to the law and order of the universe without concluding that there must be design and purpose behind it all... The better we understand the intricacies of the universe and all it harbors, the more reason we have found to marvel at the inherent design upon which it is based... To be forced to believe only one conclusion - that everything in the universe happened by chance - would violate the very objectivity of science itself... What random process could produce the brains of a man or the system of the human eye?...[125]

Max Planck (1858 - 1947)

Reputed German physicist, Max Planck, discovered a physical constant known by his name. A physics professor at the University of Berlin in the 1900s, Planck maintained that the form of radiation could be likened to the image formed by a raindrop on a windowpane, rather than water constantly flowing in a river. Until Planck, scientists used to think that light followed a wave motion. Planck, who discovered that each light particle is an energy pack, referred to each pack a "photon". The concept of photon marked a turning point in the history of physics. Light not only traveled through the air in the form of waves like sound, but also moved as particles.



Max Planck

Responsible for these groundbreaking discoveries, Planck believed in an "all-powerful intelligence which governs the universe."[126] Max Planck said that the Creator of the order in the universe is God and elaborated on his belief in God with these words:

> Anybody who has been seriously engaged in scientific work of any kind realizes that over the entrance to the gates of the temple of science are written the words: Ye must have faith. It is a quality which the scientist cannot dispense with.[127]

Charles Coulson (1910 - 1974)

Coulson, for many years a professor of mathematics at Oxford University, often mentioned his faith in God, his wish to get closer to God, his pleadings to God, and his belief that the purpose of his life was to get closer to God.[128]

OTHER SCIENTISTS OF FAITH FROM THE PAST

Every one of these scientists, whose names are listed in this section, who have made significant contributions to science, believed in Creation. These scientists are a clear example that believing in Creation does not conflict with science, and that, on the contrary, religion actually encourages science.

Leonardo da Vinci (1452-1519)
Art, Engineering, Architecture

Georgius Agricola (1494-1555)
Mineralogy

John Wilkins (1614-1672)
Astronomy and mechanics

Walter Charleton (1619-1707)
President of Royal College of Physicians

Isaac Barrow (1630-1677)
Professor of Mathematics

Nicolas Steno (1631-1686)
Stratigraphy

Thomas Burnet (1635-1715)
Geology

Increase Mather (1639-1723)
Astronomy

Nehemiah Grew (1641-1712)
Medicine

William Whiston (1667-1752)
Physics, Geology

John Hutchinson (1674-1737)
Paleontology

Jonathan Edwards (1703-1758)
Physics, Meteorology

Richard Kirwan (1733-1812)
Mineralogy

Timothy Dwight (1752-1817)
Educator

James Parkinson (1755-1824)
Medicine

William Kirby (1759-1850)
Entomology (the study of insects)

Benjamin Barton (1766-1815)
Botany, zoology

John Dalton (1766-1844)
The founder of the modern atomic theory

Charles Bell (1774-1842)
Anatomy

John Kidd (1775-1851)
Chemistry

Johann Carl Friedrich Gauss (1777-1855)
Geometry, Geology, Magnetism, Astronomy

Benjamin Silliman (1779-1864)
Mineralogy

Peter Mark Roget (1779-1869)
Physiology

William Buckland (1784-1856)
Geology

William Prout (1785-1850)
Chemistry

Edward Hitchcock (1793-1864)
Geology

William Whewell (1794-1866)
Astronomy and Physics

Richard Owen (1804-1892)
Zoology, Paleontology

Matthew Maury (1806-1873)
Oceanography, Hydrography

Henry Rogers (1808-1866)
Geology

James Glaisher (1809-1903)
Meteorology

Philip H. Gosse (1810-1888)
Ornithology (the study of birds), Zoology

Sir Henry Rawlinson (1810-1895)
Archaeology

John Ambrose Fleming (1849-1945)
Electronics

Sir Joseph Henry Gilbert (1817-1901)
Agricultural chemistry

Thomas Anderson (1819-1874)
Chemistry

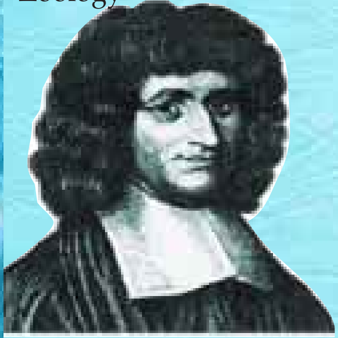
Charles P. Smyth (1819-1900)
Astronomy

John W. Dawson (1820-1899)
Geology

Henri Fabre (1823-1915)
Entomology

Bernhard Riemann (1826-1866)
Geometry

Joseph Lister (1827-1912)
Surgery


Isaac Barrow


William Ramsay


John Ambrose Fleming

John Bell Pettigrew (1834-1908)
Anatomy, Physiology

Balfour Stewart (1828-1887)
Ionospheric electricity

P.G. Tait (1831-1901)
Physics, Mathematics

Edward William Morley (1838-1923)
Nobel Laureate in physics

Sir William Abney (1843-1920)
Astronomy

Alexander MacAlister (1844-1919)
Anatomy

A.H. Sayce (1845-1933)
Archaeology

James Dana (1813-1895)
Geology

George Romanes (1848-1894)
Biology and Physiology

William Mitchell Ramsay (1851-1939)
Archaeology

William Ramsay (1852-1916)
Chemistry

Howard A. Kelly (1858-1943)
Gynecology

Douglas Dewar (1875-1957)
Ornithology

Paul Lemoine (1878-1940)
Geology

Charles Stine (1882-1954)
Organic chemistry

A. Rendle-Short (1885-1955)
Medicine

L. Merson Davies (1890-1960)
Geology, Paleontology

Sir Cecil P.G. Wakeley (1892-1979)
Medicine



Matthew Maury



Nicolas Steno

MODERN SCIENTISTS OF FAITH

Great strides were made in science in the 20th century, and many discoveries, which had remained unknown for years, were unfurled. The progress science has made has demonstrated one fact clearly: **The fact of creation.**

Each scientific discovery points to a perfect design, order, and plan, in every part of nature, living or non-living. Themselves testifying to this truth, many scientists have seen that the design of the entire universe is the work of a superior Wisdom, and have gone on to defend the fact of creation, recognizing that everything has been created by the Almighty God.

Today, there are many respected academic organizations in the West, particularly in the USA, which have been established by believing scientists. These institutions work to make clear that scientific evidence confirms the perfect design of the universe.

Some of the scientists of faith of today, who are recognized for their scientific achievements, are as follows:

Dr. Henry Fritz Schaefer

Dr. Fritz Schaefer is the Graham Perdue Professor of Chemistry, and the director of the Center for Computational Quantum Chemistry, at the University of Georgia. He has been nominated for the Nobel Prize, and was recently cited as the third most quoted chemist in the world. Schaefer, a believing scientist, aspires to better know God through his scientific pursuits. As he puts it:

> The significance and joy in my science comes in the occasional moments of discovering something new and saying to myself, 'So that's how God did it!'[129]

Isaac Bashevis Singer

One of the most noted physicists of our day, Singer, rejects the theory of evolution and believes in God. At a conference, he criticized the theory of

evolution with an interesting story: "Scientists discovered a deserted island. The scientists who stepped on the island were very impressed by what they saw there. They were fascinated by the jungles and wild animals. They climbed steep hills and examined their surroundings. They could not find the smallest sign of civilization in the island. Just when they were returning to their ship, they found a brand new watch on the beach. It was working perfectly. This was quite intriguing for the scientists. How did this watch come here? They knew for certain that no one had ever set foot on the island before them. So, there was only one other possibility. This watch, with its well crafted leather belt, glass, battery and other parts, came to this island by chance and settled on the beach. There is no other alternative." To explain the delusion of evolutionists, Singer ended his story in these words: "Every watch certainly has a watchmaker."[130]

Everything in the universe, living or non-living, possesses a superior design and perfect order. Therefore, none can be attributed to chance. It is obvious that each



is the handiwork of a supreme and almighty Creator. The majority of modern scientists, like Singer, make light of that perfection and order, to demonstrate to all that it is the work of God.

Malcolm Duncan Winter, Jr.

Prof. Winter, who received his M.D. in medicine from the Northwestern University Medical School, also believes that the universe and human beings were created by a superior Creator. He elaborated his views in his writings:

> Earth and the universe with all their complexities, life in its various forms, and finally man himself with his superior thinking ability are all too intricate to have just happened. Therefore there has to be a Master Mind, a Creator, behind it all. There must be a God.[131]

William Phillips

Phillips, who earned the Nobel Prize as early as before his 50th birthday, for the development of methods to cool and trap atoms with laser light, is a believing scientist. At a press conference following the announcement of his winning of the Nobel Prize, he noted:

> God has given us an incredibly fascinating world to live in and explore.[132]

Prof. Dale Swartzendruber

Prof. Swartzendruber, who first worked as an assistant soil scientist at the University of California, and then as an associate professor of soils at Purdue University, is also a member of Soil Science Society of America. Prof. Swartzendruber indicated, by the statement below, that the universe could not have formed by chance, and that it is the work of a Creator:

> As a matter of fact, **there is teleology, purpose, design "all over the place"**. One cannot escape it, in the heavens above or on the earth below. To deny a Great Designer is quite as illogical as to admire a



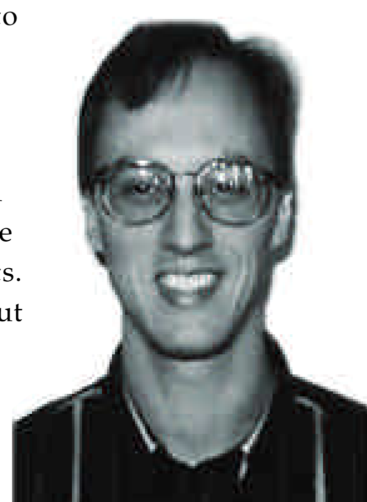
A person who sees a sown cornfield does not doubt the existence of a farmer who cultivated the corn. Prof.Dale Swartzendruber says that there is a great purpose and plan in the universe, and denying the existence of a Creator, who devised this purpose and plan, would be far more nonsensical than denying the existence of the farmer in the above example.

magnificent field of yellow, waving grain and at the same time to deny the existence of the farmer in the farmhouse by the roadside.[133]

William Dembski

The area of research pursued by Dembski, one of the leading mathematical scientists of our day, covers a wide range of disciplines, from philosophy to theology. Dembski underscores that science is an attempt to understand the world, and scientists are but discoverers in this pursuit. He presents some of his views in this way:

> The world is God's creation, and scientists in understanding the world are simply retracing God's thoughts. Scientists are not creators but discoverers... The important thing about the act of creation is that it reveals the creator. The act of creation always bears the signature of the creator.[134]



William Dembski





Prof. Meyer is a devout scientist who believes that the cell is too complicated to come about by chance.

Prof. Stephen Meyer

Meyer is an Associate Professor of Philosophy at Whitworth College. He believes in creation and has produced a number of works on the subject. In many of his works, he argues that the universe is the product of an intelligent design, and that nature bears witness to that reality. In one of his articles, he refers to the design in the cell and says:

> I argue that neither chance, nor "pre-biotic natural selection," nor physical-chemical "necessity" (in whatever theoretical guise) can explain the origin of information in the first cell.[135]

Prof. Walter L. Bradley

Walter Bradley, who is currently a professor in the department of mechanical engineering at Texas A&M University, is the author of *The Mystery of Life's Origin* He believes that the cosmos and all living and non-living things are the result of a design, and that evidence for this proliferates everywhere. Bradley's words convey his belief in the existence of a Creator:





Walter L. Bradley

In the spring of 1987, I agreed to give a presentation on Christianity and science at Cornell University. I decided to experiment with a broad, popular level treatment of Scientific Evidence for the Existence of God…. **It is abundantly clear evidence abounds for the existence of an intelligent creator** .[136]

Earl Chester Rex

Prof. Rex served as a lecturer in mathematics at the University of Southern California and then as an associate professor of physics at George Pepperdine College. Believing that the whole universe was created by God, and that it is under God's control, Prof. Rex remarked that any present theory of the origin and maintenance of the universe which ignores or denies Creation either doesn't explain all the pertinent facts or else becomes hopelessly involved and obscured.[137]

Dr. Allan Sandage

Dr. Allan Sandage, one of the most distinguished astronomers of our day, chose to accept God at age 50. In an interview published in *Newsweek* magazine, which went by the title **"Science Finds God"** , as its cover story, Sandage explained why he accepted religion:

It was my science that drove me to the conclusion that the world is much more complicated than can be explained by science. It is only through the supernatural that I can understand the mystery of existence.[138]



Prof. Cecil Boyce Hamann

Hamann, a member of faculties of Greenville College, University of Kentucky and St. Louis University Medical School, currently teaches biology at the Asbury College. He is a scientist with a firm belief in God. Hamann expressed his belief in the following words:

Wherever I turn in the realm of science there is evidence of design, law and order – of a Supreme Being …. Yes, I believe in God. I believe in a God who is not only an all-powerful Deity who created and sustains this universe, but a God who is concerned about His crown of creation, man.[139]

Paul Ernest Adolph

Prof. Adolph, formerly an associate in anatomy at St. John's University, is a member of the Fellow of American College of Surgeons. He owes his firm faith to his scientific studies. Prof. Adolph once said of his faith:

… I would say that I definitely accept for myself the existence and reality of God. My conviction results not only from experiences of a spiritual nature, but medical practice has amply confirmed what I had accepted by faith…. Yes, indeed, there is a God![140]

Lester John Zimmerman

Prof. Zimmerman, who received his Ph.D. from the Purdue University, and is professor of agriculture and mathematics at the Goshen College, discussed his faith in God in as such:

All Nature was originated by God, and He sustains it, incessantly. As I continue to study and observe the workings of Nature in soils and plants, my belief in God constantly increases, and I daily bow down before Him in wonderment and praise.[141]

Enrico Medi

Eminent Italian scientist, Enrico Medi, spoke of the miracles a scientist comes across, and about the conclusion he finally arrived at, at an international conference in Rome in 1971:

> …there is a cause, outside of space, outside of time, the master of being, which made being to be in this way. And this is God...[142]

Wayne U. Ault

Prof. Ault earned a postgraduate degree from Columbia University, and was research fellow in Geochemical Laboratory, New York. Prof. Ault stated that scientific research enhances one's commitment to God:

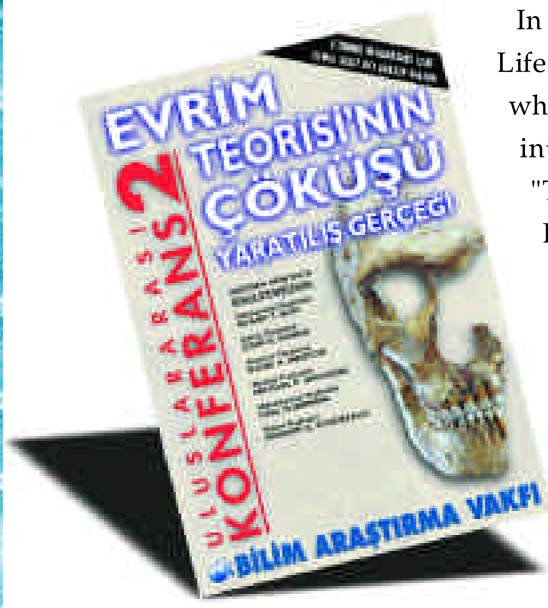
> The quest for knowledge and the inquisitiveness which asks the why and the how of Nature are part of the endowed traits of mind. Once the scientist has exercised faith in the Creator of the universe this faith can only grow as a result of studies in any direction.[143]

Prof. Michael P. Girouard

Michael Girouard, a professor of biology at Southern Louisiana University, believes that life could not have come about by chance, and that the highly complex and perfect structure of proteins and the cell, the basic units of life, were created by God.



Prof. Michael Girouard (far right) participated as a speaker at the international conference of "The Collapse of Evolution: The Fact of Creation", organized by the Science Research Foundation, in Istanbul.



The poster of the Second International Conference named "The Collapse of the Theory of Evolution: The Fact of Creation" organized by the Science Research Foundation on July 5, 1998 in Istanbul.

In a speech titled, "Is it Possible for Life to Emerge by Coincidences?", which he presented at the second international conference, named "The Collapse of the Theory of Evolution: The Fact of Creation", organized by the Science Research Foundation on July 5, 1998 in Istanbul, Prof. Girouard supported that opinion with scientific evidence, and ended his speech with the following words:

The makeup of living things is far more complicated than the results obtained in laboratory experiments. When we turn to the laws of chemistry and physics for an explanation, this is what we learn: **There must definitely be an Intelligence, a Creator; a Creator who has ordered these laws.** This is the most scientific explanation. The laws of physics and chemistry reveal to us in all certainty that **the evolution and formation of living things from inanimate matter is impossible** . **In respect of these scientific findings** , this not only bring an end to my speech, but also **an end to evolution** .[144]

Prof. Edward Boudreaux

Dr. Edward Boudreaux, a professor of chemistry at the University of New Orleans, believes that chemical elements must have been deliberately arranged by God for life to be formed. Prof. Boudreaux said in his speech titled "The Design in Chemistry", which he offered at the second international conference, named "The Collapse of the Theory of



Prof. Edward Boudreaux

Prof. Boudreaux offered a speech entitled "The Design in Chemistry", at the international conferences of "The Collapse of the Theory of Evolution: The Fact of Creation", organized in Istanbul and Ankara.

Evolution: The Fact of Creation" organized in Istanbul, that **"the world we live in, and its natural laws are very precisely set us by the Creator for the benefit of us, humans"** .[145]

Prof. Kenneth Cumming

Prof. Kenneth Cumming, a world-renowned scientist from the Institute for Creation Research in the USA, is an authority on biochemistry and paleontology. He stated that he is opposed to the theory of evolution and believes in the existence of God.



Prof. Kenneth Cumming

World-renowned scientist Prof. Cumming is the member of the Institute for Creation Research in the USA.

Complexity at all levels, is seen. Uniqueness at all levels. Whether it is cellular level, at the organ level, at the body level, at the system level, these complexities are apparent... Cells and bodies are wonderfully made. Within a wide range of living machines, these are complex associations of proteins, fats, they build and tear down the tissues as well as synthesize and burn food... They show very intricate design features.[146]

Prof. Carl Fliermans



Prof. Carl Fliermans

Prof. Fliermans, a scientist widely-recognized in the USA, is a professor of microbiology at Indiana University. He conducts research on "the neutralization of chemical wastes by bacteria" sponsored by the US Department of Defense. At the conference for "The Collapse of The Theory of Evolution: The Fact of Creation", which he attended in Istanbul, he refuted the evolutionary claims in the realm of biochemistry. In his speech, he stated his belief in God thus:

> Modern biology proves that life forms did not come about by chance, which constitutes evidence for the superior creation by God.[147]

Prof. David Menton

Prof. David Menton, who affirmed his belief in God by saying **"I've been examining the anatomies of living things for 30 years. Every time, I came across the reality of God's perfect creation."**[148], is a professor of anatomy at the University of Washington.

Prof. Menton is one of the renowned scientists who participated in the conference series organized by the Science Research Foundation in Turkey .



Prof. David Menton

Prof. John Morris

The famous geologist, Professor Morris, is the president of the Institute for Creation Research, which is the most prolific organization in the USA, formed by scientists defending creation. In a speech, Prof. Morris referred to his faith in God, and his belief that the theory of evolution has been refuted by science, in the following manner:

> As do many noted and qualified scientists, we, as devout believers in God, believe that God is the Creator. It is God who rules over our lives and to whom we must turn. We owe our lives to Him and we are responsible for earning His good pleasure.[149]

Arthur Peacocke

Arthur Peacocke, whose primary scientific discipline was physical biochemistry, is director of the Ian Ramsey Centre at Oxford University. He proclaims his belief in God as such:

> God creates and is present to each instant of the time of the created world; God transcends past and present time: God is eternal, in the sense that there is no time at which he did not exist nor will there be a future time at which he does not exist.[150]

Albert McCombs Winchester

Having completed his postgraduate studies at the University of Texas, Prof. Winchester served as a professor of biology at the Baylor University, and was president of the Florida Academy of Science. He maintained that scientific research fortifies his belief in God:

> Today, I am happy to say, after many years of study and work in the fields of science, my faith in God, rather than being shaken, has become much stronger and acquired a firmer foundation than heretofore. Science brings about an insight into the majesty and omnipotence of the Supreme Being which grows stronger with each new discovery.[151]

Mehdi Golshani

Physicist Mehdi Golshani, of Sharif University of Technology in Tehran, in an interview he gave to *Newsweek* outlined his belief in God and that scientific research complements religion:

> Natural phenomena are God's signs in the universe and studying them is almost a religious obligation. The Koran asks humans to **"travel in the earth, then see how He initiated the creation."** Research is a worship act, in that it reveals more of the wonders of God's creation.[152]

Prof. Edwin Fast

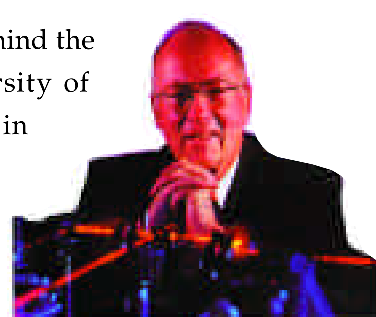
Having completed his postgraduate work at the University of Oklahoma, and having taught at the same university in the department of physics, Prof. Fast maintains that it is completely impossible for atoms, the building blocks of matter, to have come together spontaneously to form the entire universe and living things. He expressed his belief in creation in these words:

> Regressing far enough one must finally reach the conclusion that the existence of "natural laws", which describe systematics in the universe, is evidence of an Intelligence who chose to establish the operation of the universe as we observe it... The Cause which created the particles logically also determined the properties they were to have.[153]

Charles H. Townes

Townes, who discovered the principle behind the laser, conducts his studies at the University of Berkeley. Townes stated his belief in God in this way:

> As a religious person, I strongly sense the presence and actions of a creative being far beyond myself and yet always personal and close by.[154]



Charles H. Townes

John Polkinghorne

John Polkinghorne, who has had a distinguished career in particle physics at Cambridge University, made the following statement in an interview with *Newsweek*:

When you realize that the laws of nature must be incredibly finely tuned to produce the universe we see, that conspires to plant the idea that the universe did not just happen, but that there must be a purpose behind it…For me, the fundamental component of belief in God is that there is a mind and a purpose behind the universe.[155]

Hugh Ross

Hugh Ross, who holds a Ph.D. in astronomy from the University of Toronto, is President of "Reasons to Believe", a creationist institute in the USA. He has written many works on the relationship between cosmology and creation. Some of these are: *The Creator and the Cosmos*, *Creation and Time*, and *Beyond the Cosmos*. Some of Ross' remarks about the creation of the universe by a Creator are as follows:

If time's beginning is concurrent with the beginning of the universe, as the space-time theorem says, then the cause of the universe must be some entity operating in a time dimension completely independent of and pre-existent to the time dimension of the cosmos. …It tells us that the Creator is transcendent, operating beyond the dimensional limits of the universe.[156]

An intelligent, transcendent Creator must have brought the universe into existence. An intelligent, transcendent Creator must have designed the universe. An intelligent, transcendent Creator must have designed planet Earth. An intelligent, transcendent Creator must have designed life.[157]

Prof. Dr. Duane Gish

Duane Gish, who earned a Ph.D. in biochemistry from University of California, Berkeley, is a respected scientist known for his religious





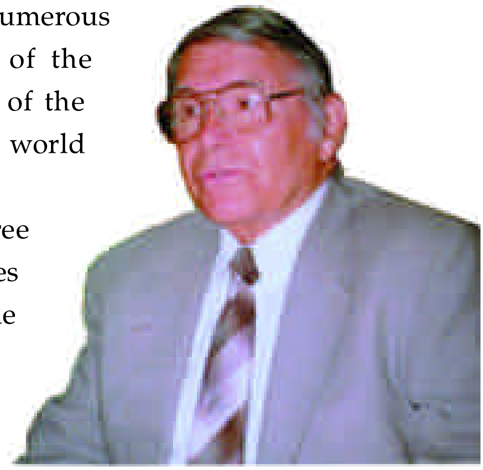




The Science Research Foundation organized international conferences titled "The Collapse of Evolution: The Fact of Creation", held on April 4, 1998, and July 5, 1998, in Istanbul, and on July 12, 1998, in Ankara. World-renowned and respected scientists of faith were invited to the conferences as speakers.

conviction and his fight against the theory of evolution. Gish gave speeches at numerous conferences about the invalidity of the theory of evolution, and he is one of the foremost creationist debaters in the world today.

Prof. Gish has participated three times as a speaker at the conferences titled "The Collapse of Evolution: The Fact of Creation", organized in 1998 in Turkey. Of the collapse of the theory of evolution, and his strong faith in creation, according to Gish:


Prof. Duane Gish

> The theory of evolution is in a desperate crisis. On the contrary, the idea of creationism is backed by sound evidence. Today, thousands of scientists find the idea of creation increasingly convincing.[158]

Dr. Pierre Gunnar Jerlstrom

Jerlstrom, who received his Ph.D. in molecular biology from Griffith University, conducted numerous studies in his field, and was honored with several scientific awards. Dr. Jelstrom's articles are published in various scientific magazines. He is also known for his belief in creation.

Dr. Stephen Grocott

Grocott has a Ph.D. from the University of Western Australia, in the field of organometallic chemistry of optically active metal complexes. He has worked for years as a research scientist in the field of alumina refining, environmental, analytical and industrial chemistry. He has published numerous papers in these fields. After many years as a passive evolutionist, he was stunned by the logic, completeness, and overwhelming mass of scientific evidence in support of Special Creation. Grocott is also a dynamic public speaker on this topic.

Dmitry Kouznetsov

The Russian scientist Kouznetsov remarks that a large number of scientists have come to believe in God and religion in the face of the scientific facts they have discovered. Kouznetsov is also an ardent debater with evolutionists.[159]

Dr. Emil Silvestru

Dr. Emil Silvestru has worked as an associate professor in Babes-Bolyai University, Romania. An internationally respected authority on the geology of caves, he has published numerous scientific papers in academic journals worldwide. He was until recently the head scientist at the world's first speleological institute (speleology = the study of caves), and is a creationist scientist.

Dr. Andre Eggen

Dr. André Eggen, who has conducted a great deal of research on animal genetics, has been working as a research scientist for the French government. Eggen believes in creation.

Dr. Ian Macreadie

Dr. Ian Macreadie is a molecular biologist who has done extensive research on molecular biology and microbiology. Author of more than 60 research papers, he is a Principal Research Scientist at the Biomolecular Research Institute of Australia's Commonwealth Scientific and Industrial Research Organization (CSIRO). Dr. Macreadie, who believes in creation, also won the Australian Society for Microbiology's top award, for outstanding contributions to research.

Prof. Andrew Conway Ivy

One of the most famous physiology experts in the world, Andrew Ivy was the Head of the Department of Physiology and Pharmacology of Northwestern University Medical School between 1925-1946. Prof. Ivy was Vice President of the University of Illinois from 1946 to 1953, and then he served as a Distinguished Professor of Physiology and Head of the Department of Clinical Science, University of Illinois, College of Medicine, Chicago. When asked, "Is there a Creator who created the universe?", he replied, "Yes, I am as certain that there is a God as I am certain of anything", and went on to say:

> Belief in the existence of God provides the only complete, ultimate and rational meaning to existence. Belief in God is the only ultimate reason for the absolute certainty that man is a person and something more than a parcel of matter and energy. Belief in God is the source and the ultimate basis of the most inspired conception of the human mind.[160]

Dr. Raymond Jones

Dr. Jones has served for years in highly respected scientific agency of Australia's government, the CSIRO. He is best known for solving the Leucaena problem, which has earned millions of dollars for the Australian farming industries. Jones is a creationist scientist.

Jules H. Poirier

Jules H. Poirier has worked for the U.S. Navy as a senior electronic design specialist engineer for high-powered defense and space projects. He studied electrical engineering, physics and mathematics at the University of California at Berkeley. During his professional career, Jules Poirier was responsible for many design solutions and innovations, which helped the U.S. defense forces and the space program. Discovering the superior feats of wisdom in animals, Poirier concluded that they must have been created by a Creator. He is the author of the book *From Darkness*

to Light to Flight: Monarch - the Miracle Butterfly, where he elaborates on this issue.

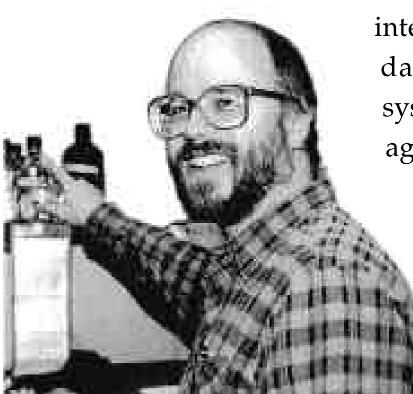
Michael J. Behe

Michael J. Behe is one of the most renowned scientists to believe that the cosmos and all living things are the work of an intelligent design. Behe is a professor of biochemistry at Lehigh University in Pennsylvania. He has published numerous articles in well-known newspapers such as *The New York Times* and *Boston Review*. Behe is the author of *Darwin's Black Box*, which has proved that biologically the theory of evolution cannot be true, distributed in over 80 reprints worldwide.

Behe proves the invalidity of the theory of evolution with a concept he calls "irreducible complexity". According to this idea, many organs are composed of several well-matched, interacting parts that contribute to the basic function, wherein the removal of any one of the parts causes the system to effectively cease functioning. For this reason, coincidental or gradual development is out of the question.

In *Darwin's Black Box*, Behe wrote:

> They were designed not by the laws of nature, not by chance and necessity; rather; they were planned. The designer knew what the systems would look like when they were completed, then took steps to bring the systems about. Life on earth at its most fundamental level, in its most critical components, is the product of intelligent activity. The conclusion of intelligent design flows naturally from the data itself... Inferring that biochemical systems were designed by an intelligent agent is a humdrum process that requires no new principles of logic and science. It comes simply from the hard work that biochemistry has done over the past forty years,



Michael J. Behe

combined with consideration of the way in which we reach conclusions of design every day.[161]


Philip Johnson

Philip Johnson

Johnson, who has taught law in the University of California at Berkeley, has conducted extensive research on the ideological aspect of the theory of evolution. Johnson is the author of three books on this matter, titled *Darwin on Trial*, *Reason in the Balance*, and *Objection Sustained*, as well as two massive books on criminal law, and numerous articles. Johnson, known for his strong opposition to the theory of evolution, is also a scientist who believes in God. Johnson's belief and pursuit is apparent in these words:



...I want to develop a challenge to materialistic evolution. Let's unite around the Creator .[162]

Charles Birch

Charles Birch is professor emeritus at the University of Sydney, Australia. He is known for his firm faith in creation. He was awarded the Templeton Prize for Progress in Religion in 1990. His faith finds expression in his below:

God as the source of all value was "nearer than hands and feet, closer than breathing. The experience of God was real... God is both cause in creating the world and effect in experiencing the world.[163]

S. Jocelyn Bell Burnell



S. Jocelyn Bell Burnell

Jocelyn Bell Burnell is a professor of physics at the Open University in England, and chairs the department. An astronomer, she is one of the discoverers of the spinning stars called pulsars. Burnell, who has strong faith in God, wrote:

> I believe in a God who is powerful and all-knowing, but also caring and forgiving... I am sure that there is a God.[164]

Prof. Owen Gingerich

Owen Gingerich is a professor of astronomy and the history of science at the Harvard-Smithsonian Center for Astrophysics, Cambridge, Massachusetts. He has a deep faith in God, which he declared in these words:

> I believe in God as the superintelligence who planned and guided the creation of the universe... I believe that the creation of humanity is a principal purpose of the universe and that humankind was created in the image of God, particularly with respect to consciousness, conscience, and the moral freedom to choose right and wrong.[165]

Prof. Carl Friedrich von Weizsacker

Weizsacker, physicist and philosopher, is a professor at the Max-Planck-Gesellschaft in Germany. He expressed his belief in God in the following manner:

> On a beautiful starry night in the Jura Mountains of Switzerland I perceived two certainties: here God is present; and the stars are spheres of gas, as physics teaches us today.[166]

Prof. David Berlinski

David Berlinski, who received his Ph.D. in mathematics from Princeton University, believes that living things did not evolve, but are the products of intelligent design. In his works, Berlinski often refers to God as the author of this design. The following quotes from Berlinski are examples of this:

> The structures of life are complex, and complex structures get made in this, the purely human world, only by a process of deliberate design. An act of intelligence is required to bring even a thimble into being; why should the artifacts of life be different?[167]

> Molecular biology has revealed that whatever else a living creature may be – God's creation.[168]

Prof. William Lane Craig

William Craig earned a doctorate in philosophy at the University of Birmingham, England, before earning a doctorate in theology, from the Ludwig Maximiliens Universitat-Munchen, West Germany. He believes that the universe was created by God for a special purpose. Craig's views are reflected in these remarks:

> …the universe has a cause of its existence. In fact, I think that it can be plausibly argued that the cause of the universe must be a personal Creator. For how else could a temporal effect arise from an eternal cause?… We have seen on the basis of both philosophical argument and scientific confirmation that it is plausible that the universe began to exist. Given the intuitively obvious principle that whatever begins to exist has a cause of its existence, we have been led to conclude that the universe has a cause of its existence. On the basis of our argument, this cause would have to be uncaused, eternal, changeless, timeless, and immaterial. Moreover, it would have to be a personal agent who freely elects to create an effect in time. Therefore, on the basis of the kalam cosmological argument, I conclude that it is rational to believe that God exists.[169]

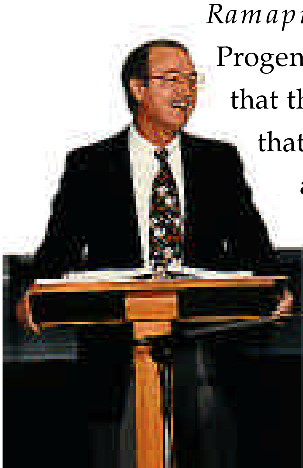
Indeed, given the truth of the maxim ex nihilo nihil fit (out of nothing comes nothing), the Big Bang requires a supernatural cause. Since the initial cosmological singularity represents the terminus of all space-time trajectories, there cannot be any physical cause of the Big Bang. Rather, the cause must transcend physical space and time: it must be independent of the universe, and unimaginably powerful. Moreover, this cause must be a personal being, endowed with free will. The cause of the origin of the universe must therefore be a personal Creator, who a finite time ago brought the universe into existence by his free agency.[170]

Dr. Kurt Wise

Paleontologist Dr. Kurt Wise, who is an Assistant Professor of Science at the Department of Mathematics and Natural Science of Bryan College, is known for his opposition to the theory of evolution and his firm faith in God. "Creation isn't a theory" he says. "The fact that God created the universe is not a theory - it's true."[171]

Sigrid Hartwig Scherer

Sigrid Hartwig-Scherer, who received his Ph.D. in physical anthropology from the University of Zurich, is the author of *Ramapithecus-Vorfahr des Menschen?* (Ramapithecus – Progenitor of Humans?) In her works, she demonstrates that the fossil record refutes the theory of evolution, and that apes are not the ancestors of humans. She feels that all creatures are the work of a Creator.


J. P. Moreland

J.P. Moreland

J.P. Moreland, Ph.D. in philosophy from the University of Southern California, is a faithful scientist, and the author of Christianity and the Nature of Science, and The Creation Hypothesis.



Paul A. Nelson

Paul A. Nelson

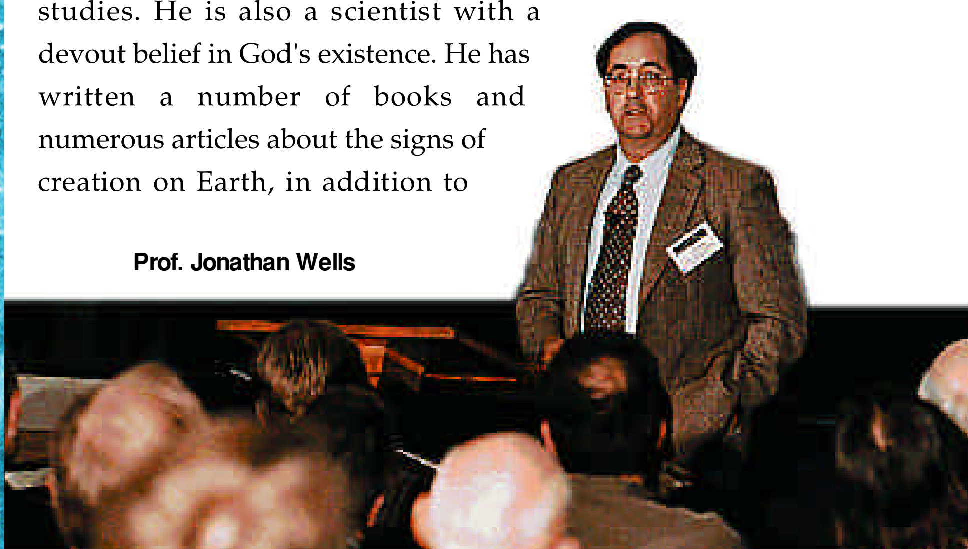
He received his Ph.D. in philosophy from the University of Chicago. He is one of the scientists who believe that life is the product of an intelligent design.

Prof. Jonathan Wells

Jonathan Wells, Ph.D. in religious studies from Yale, and postdoctoral research biologist in the department of molecular and cell biology, at the University of California at Berkeley, is the author of *Charles Hodge's Critique of Darwinism*. Wells holds that the latest developments in science show that life is the work of design.

Dr. Don Batten

Don Batten has done extensive research in plant physiology and has won a number of academic rewards for his studies. He is also a scientist with a devout belief in God's existence. He has written a number of books and numerous articles about the signs of creation on Earth, in addition to



Prof. Jonathan Wells

his own field, which is plant physiology. He also toured the world offering lectures in which he explained God's signs to people in non-academic language. The Australian scientist conducted his first lecture tour in England in 1995.

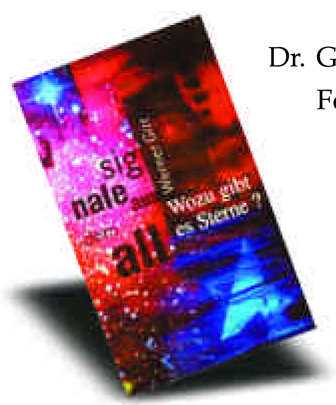
Dr. John Baumgardner

Dr. Baumgardner, who earned a Ph.D. in geophysics and space physics from University of California, Los Angeles, was led by his research into the impasses of the theory of evolution to denounce the theory, and admit to Creation, despite having received an evolutionist education.

Prof. Dr. Donald Chittick

Dr. Donald Chittick received his Ph.D. in physical chemistry from Oregon State University. He has been honored with many awards for his research. He offers lectures in subjects such as "Evidence for Creation" and "Creation and the Early Earth".

Dr. Werner Gitt



Dr. Gitt is a director and professor at the German Federal Institute of Physics and Technology (Physikalisch-Technische Bundesanstalt, Braunschweig). He has written numerous scientific papers in the fields of information science, mathematics, and control engineering. Dr. Gitt, who believes in Creation, has also written many books in which he criticizes the theory of evolution. The titles of his books are *Did God Use Evolution?*, *In the Beginning was Information*, *Stars and their Purpose: Signposts in Space*, and *If Animals Could Talk*.

Dr. Gary E. Parker

En route to his M.S. in Biology/Physiology from Ball State, Dr. Parker earned several academic awards. He began his career as an evolutionist. Faced with convincing scientific evidence supporting creation, Dr. Parker abandoned the theory of evolution, and admitted to the existence of the Creator. He has published a number of books in biology and creation science, and has lectured worldwide on creationism.

Dr. Margaret Helder

Dr. Helder is a scientist, a botanist, and Vice-President of the Creation Science Association of Alberta, Canada. She is also probably the most prominent woman in creation science. She has written numerous articles about the signs of creation surrounding us.

Prof. Dr. Jonathan D. Sarfati

Dr. Sarfati, who obtained a Ph.D. in chemistry from Victoria University of Wellington, has co-authored many papers in mainstream scientific journals. He has long been interested in the defense of faith, and he is currently an active research scientist in creationism.

Prof. Robert Matthews

A graduate in physics from Oxford University and a fellow of the Royal Statistical Society and Royal Astronomical Society, Robert Matthews described God's miracle of creation in his book published in 1992:

> The whole process normally takes place in perfect harmony, producing a foetus, then a living baby, a child and finally an adult. Like so much in biology, the whole process is seemingly miraculous. How can such stunning complexity be produced from such simple beginnings? How, in short, does a single cell far smaller than the dot of this letter "i" produce a sentient being? Many of the processes involved remain

mysterious, and constitute one of the most fascinating of all the Outstanding Mysteries.[172]

Dr. Claude Tresmontant

Dr. Claude Tresmontant, of the University of Paris, in an interview in *Realities* magazine, described his faith in creation, and his belief that the Earth could not have come into being by chance:

No theory of chance can explain the creation of the world…It makes no sense to say that chance can account for the creation of being.[173]

Dr. Don Page

Don Page received his Ph.D. in physics from the California Institute of Technology in 1976, and has worked with noted scientists since then. Page believes that comprehending the universe helps in coming to an awareness of God's might and wisdom, though not sufficient to fully grasp it.

Dr. Andrew Snelling

Dr. Snelling, Ph.D. in geology, has been involved in research projects with various CSIRO (Commonwealth Scientific Industrial Research Organization), ANSTRO (Australian Nuclear Science and Technology Organization) and University scientists across Australia, and with scientists from the USA, Britain, Japan, Sweden and the International Atomic Energy Agency. As a result of this research Andrew is involved in the writing of scientific papers that are being published in international scientific journals. He has been honored with a number of prizes for his contribution to creation science, and has written numerous articles on the signs of creation in living things.

Dr. Carl Wieland

Dr. Carl Wieland, a creationist medical doctor, is in great demand as a speaker on the scientific evidence for creation. He has also authored numerous articles on the subject, which have been published internationally.

OTHER MODERN SCIENTISTS OF FAITH

There are a great many scientists all over the world who believe in God. All of the successful scientists of our day who are listed here oppose the idea that living things have come into being by chance, and believe that God created the entire universe according to an intelligent design.

John K.G. Kramer
Biochemistry

Dr. Jerry Bergman
Psychology

Dr. Kimberly Berrine
Microbiology and Immunology

Jay L. Wile
Nuclear Chemistry

Prof. Vladimir Betina
Biochemistry and Biology

Dr. Andrew Bosanquet
Biology and Microbiology

Dr. David R. Boylan
Chemical Engineering

Dr. Clifford Burdick
Geology

Robert Kaita
Plasma Physics

Alexander V. Lalomov
Geology

Prof. Dr. Steve Austin
Geology

Prof. Robert Newman
Astrophysics

Prof. Siegfried Scherer
Biology

Dr. Russell Humphreys
Physics

Dr. Geoff Downes
Plant physiology

Dr. Larry Butler
Biochemistry

Prof. Linn E. Carothers,
Statistics

Prof. Sung-Do Cha
Physics

David Dewitt
Neuroscience

Prof. Dr. Eugene F. Chaffin
Physics

Dr. Choong-Kuk Chang
Genetic Engineering

Prof. Chung-Il Cho
Biology

Dr. Harold Coffin
Paleontology

Dr. Jack W. Cuozzo
Medicine

Dr. Malcolm Cutchins
Aerospace Engineering

Dr. Lionel Dahmer
Organic Chemistry

Dr. Raymond V. Damadian
Physics

Dr. Chris Darnbrough
Biochemistry

Dr. S. E. Aw
Biochemistry

Dr. Thomas Barnes
Physics

Dr. Paul Ackerman
Psychology

Dr. Douglas Dean
Biological chemistry

Dr. Don DeYoung
Astronomy, atmospheric physics

Prof. Danny Faulkner
Astronomy

Prof. Dennis L. Englin
Geophysics

Prof. Robert H. Franks
Biology

Dr. Donald Hamann
Food Scientist

Dr. Barry Harker
Philosophy

Dr. Charles W. Harrison
Applied Physics

Dr. Harold R. Henry
Engineering

Dr. Joseph Henson
Entomology

Robert A. Herrmann
Mathematics

Dr. Russell Humphreys
Physics

Dr. Jonathan W. Jones
Medicine

Dr. Valery Karpounin
Mathematics

Dr. Dean Kenyon
Biology

Dr. John W. Klotz
Biology

Dr. Vladimir F. Kondalenko
Cytology, Cell Pathology

Dr. Leonid Korochkin
Genetics, Molecular biology, Neurobiology

Prof. Jin-Hyouk Kwon
Physics

Prof. Myung-Sang Kwon
Immunology

Prof. John Lennox
Mathematics

Dr. John Leslie
Biochemistry

Prof. Lane P. Lester
Biology, Genetics

Prof. George D. Lindsay
Science Education

Dr. Alan Love
Chemistry

Prof. Marvin L. Lubenow
Anthropology

Dr. Andrew McIntosh
Aerodynamics

Dr. John Mann
Agriculturist

Dr. Frank Marsh
Biology

Dr. Ralph Matthews
Radiation chemistry

Dr. John Meyer
Physiology

Dr. Henry M. Morris
Hydrology

Dr. Len Morris
Physiology

Dr. Graeme Mortimer
Geology

Prof. Hee-Choon No
Nuclear Engineering

Dr. David Oderberg
Philosophy

Prof. John Oller
Linguistics

Prof. Chris D. Osborne
Biology

Dr. John Osgood
Medicine

Dr. Charles Pallaghy
Botany

Prof. J. Rendle-Short
Pediatrics

Dr. Jung-Goo Roe
Biology

Dr. David Rosevear
Chemistry

Dr. Young-Gi Shim
Chemistry

Dr. Mikhail Shulgin
Physics

Dr. Roger Simpson
Engineering

Dr. Harold Slusher
Geophysics

Prof. Man-Suk Song
Computer Science

Prof. James Stark
Science Education

Prof. Brian Stone
Engineering

Dr. Lyudmila Tonkonog
Chemistry, Biochemistry

Dr. Larry Vardiman
Atmospheric science

Dr. Joachim Vetter
Biology

Dr. Noel Weeks
Zoology

Dr. A. J. Monty White
Chemistry, Gas kinetics

Prof. A. E. Wilder-Smith
Organic chemistry and pharmacology

Dr. Clifford Wilson
Archaeology

Prof. Verna Wright
Medicine

Prof. Seoung-Hoon Yang
Physics

Dr. Ick-Dong Yoo
Genetics

Dr. Sung-Hee Yoon
Biology

CONCLUSION

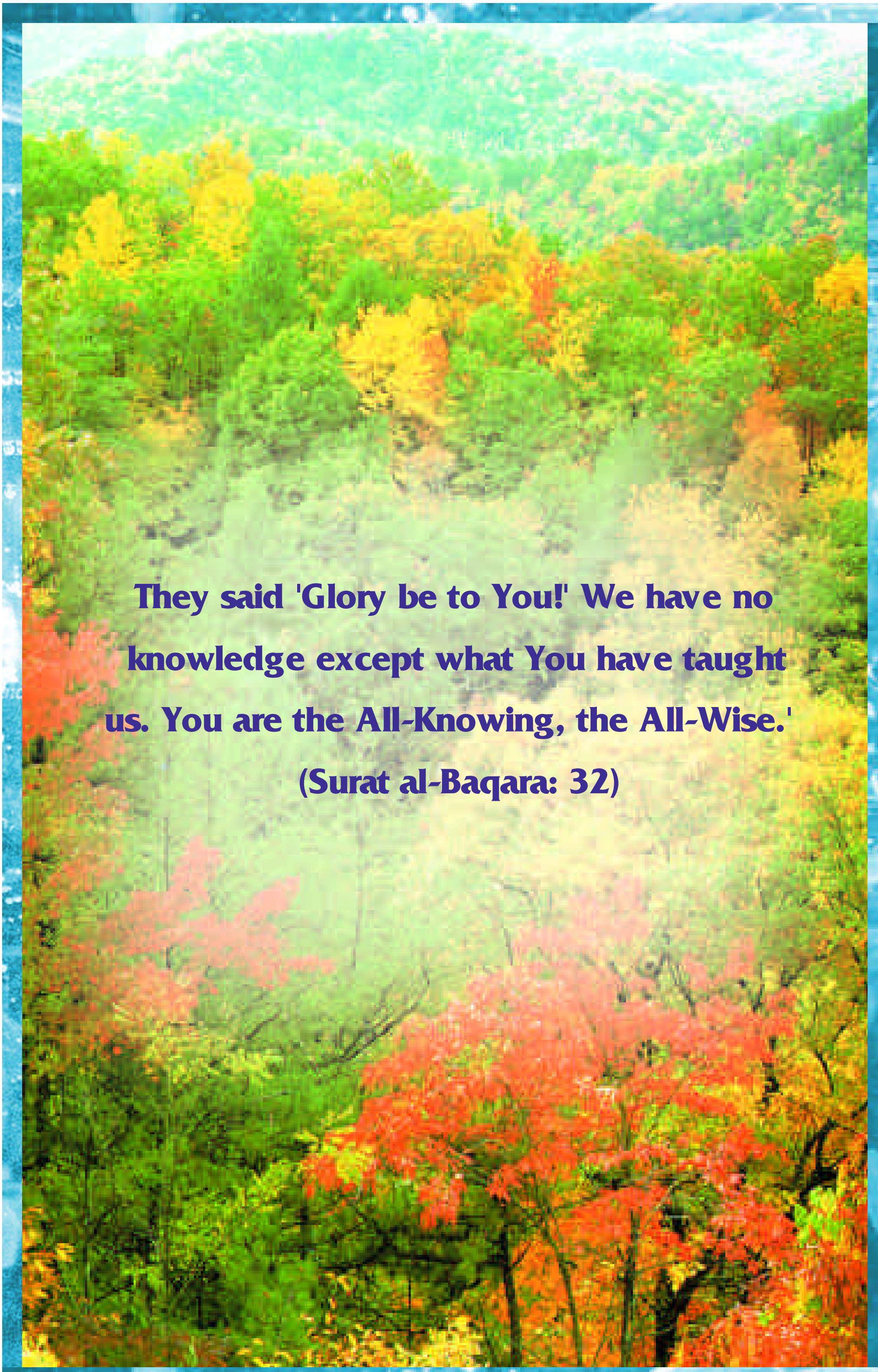
Religion is the primary source for providing man with the most accurate knowledge regarding the creation of the universe and of life. When we say "religion", however, we refer to the "Qur'an" and the Sunnah of our Prophet, peace be upon him, as the true source of information. The holy books of other religions have been altered over time and can no longer be considered as Divine Books.

The Qur'an, on the other hand, is definitely the word of God and contains no contradictions. It is the book God has sent down to His servants as guidance. With many verses, God stated that the Qur'an is the ultimate revelation, and that it is under His protection. A verse in Surat al-Hijr reads:

"It is We Who have sent down the Reminder (the Qur'an) and We Who will preserve it." (Surat al-Hijr: 9)

Therefore, science will advance speedily only if it is guided by the Qur'an, adopting its revelations, for only then may science adhere to way of God. When a way opposite to religion is adopted, scientists waste both time and resources, and impede the progress of science.

As in all other fields of endeavor, the way to be followed in the scientific field is again the "way" commanded by God in the Qur'an. As God proclaims, **"This Qur'an guides to the most upright Way..."** (Surat al-Isra': 9)



They said 'Glory be to You!' We have no knowledge except what You have taught us. You are the All-Knowing, the All-Wise.'

(Surat al-Baqara: 32)

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